

## DEPARTMENT OF THE ARMY UNITED STATES ARMY LEGAL SERVICES AGENCY 901 NORTH STUART STREET ARLINGTON, VA 22203-1837



9 June 2008

Environmental Law Division

Humane Zia (3HS62) U.S. Environmental Protection Agency Region III 1650 Arch Street Philadelphia, PA 19103-2029

RE: Follow-up to CERCLA 104e letter regarding the Safety Light Corporation Site, Bloomsburg, Pennsylvania

Dear Ms. Zia:

This responds to your 14 March 2008 follow-up letter to your CERCLA 104e Request regarding the Safety Light Corporation Site in Bloomsburg, Pennsylvania (the "Site"). I have reviewed your information and provide the following response.

Your documents identified a contract with the New York District of the Army Corps of Engineers. The Army Corps of Engineers office of counsel searched for records responsive to your follow-up request and located one document, The Archives Search Report (the "Report") for the Marion Engineer Depot (the "Depot"). While nothing in the Report mentions the Site or indicates whether the Depot sent anything to the Site for repair or disposal, it provides some general information about the Army's storage of metascopes and bridge markers at the Depot.<sup>1</sup>

The Report identified three accessions, 77-52A-0259, 77-53A-0325 and 77-55A-0323, located in the National Federal Record Center, Suitland, Maryland that relate to the inspection of metascopes at the Depot. Further research indicated that these documents have been shipped to the National Archives at College Park, Maryland. These records are no longer in Army control and are equally available to the Environmental Protection Agency. I have not reviewed these documents.

<sup>&</sup>lt;sup>1</sup> Enclosure 1 contains the pertinent sections of this report to include the table of contents, introduction, and list of previous investigations, chronological site summary and records review summary; a description of area C and Building 517 which was used to store the metascopes and two photographs; interview summaries and redacted conversation records of three employees; a radiological characterization study of building 517; a mission statement for the Depot; and a memo from the Executive Officer, Don Burdette to Chief of Engineers regarding the Inspection of Metascopes dated 13 Dec 1950.

The Fort Belvoir command historian and Night Vision Electronics Lab employees searched for but could not find any documents responsive to EPA's request. I contacted one former Army employee, Mr. Myron Klein, a Fort Belvoir employee who developed the Type F metascope and was an inspector of metascopes manufactured by Sampson during WWII. I provided Mr. Klein with Attachment 7 to Enclosure 1, the memo dated 1950 that described his trip to the Depot. He recalled this was the only time he visited the Depot. When he went inside one of the two igloos, he saw potentially 50,000 metascopes stored in wooden crates, about 50 per crate. He also saw a box that contained approximately 3000 blitzes. He did not know whether any metascopes or the storage containers were sent to the Site for repair or disposal. He went specifically for the metascopes and did not see any bridge markers, signs, illuminating paint, or other potentially radioactive material at the Depot, nor does he know if any were shipped to the Site.

I searched for records at the National Personnel Record Center, St. Louis, Missouri by looking at the 018 Report index for Record Group 338, Records of Army Commands for accessions of records pertaining to the Depot. I found one accession, 338-60-9000. I requested a copy of the SF 135 for that accession, and learned that the accession had been transferred to the National Archives at College Park, Maryland in 1991. Since the accession is no longer in Army control and is equally available to the Environmental Protection Agency, I have not reviewed that accession.

I submitted a request for documents related to the Depot to the Federal Record Center in the Great Lakes Region, Chicago, Illinois and found that these records have been transferred to the National Archives, Great Lakes Region, Chicago, Illinois. Enclosure 2, the attached record index, identifies that the records consist of installation historical files, newspapers, organization planning files, progress analysis files, standard operating procedures, general orders, brochures, pamphlets and conference files. As these records are no longer in Army control and are equally available to the Environmental Protection Agency, I have not reviewed them.

Mr. Jeffrey Smart, the command historian at the Research Development Engineering Command, Aberdeen, Maryland did not locate any responsive documents. I contacted the radiation safety personnel Rich Fliszar at the US Army Research, Development and Engineering Command and Tom Gizicki at Rock Island Arsenal. Both did not find any records responsive to your request and stated that their records go back to 1970.

To discuss this matter further you may contact me at (703) 696-1566.

Sincerely,

Carrie M. Greco Litigation Attorney

Canu M. Dreso

ENCLI

• ÷ 

## DEFENSE ENVIRONMENTAL RESTORATION PROGRAM for FORMERLY USED DEFENSE SITES

#### FINDINGS

HAZARDOUS, TOXIC AND RADIOLOGICAL WASTE
ARCHIVES SEARCH REPORT
FOR
MARION ENGINEER DEPOT
MARION, OHIO
PROJECT NUMBER G050H015003

July 1998

Prepared For
U.S. Army Corps of Engineers
Louisville District
ATTN: CELRL-DL-B
P.O. Box 59
Louisville, Kentucky 40201-0059

Prepared by
U.S. Army Corps of Engineers
Rock Island District
ATTN: CEMVR-ED-DO
P.O. Box 2004
Rock Island, Illinois 61204-2004

and

Defense Ammunition Center ATTN: SIOAC-ESL Savanna, Illinois 61204-9639

# HAZARDOUS, TOXIC AND RADIOLOGICAL WASTE ARCHIVES SEARCH REPORT

MARION ENGINEER DEPOT MARION COUNTY, OHIO PROJECT NUMBER G050H015003

## FINDINGS

## TABLE OF CONTENTS

Sec	tion		rage
1.	INT	RODUCTION	.1
	a. b.		
2.	PRE	VIOUS INVESTIGATIONS	.1
		1992 Preliminary Assessment Other Previous Investigations	
3.	SIT	E DESCRIPTION	.12
	d. e. f.	Existing Land Usage Climatic Data Topography Geology and Soils Hydrology Natural Resources Historical/Cultural Resources	
4.	HIST	TORICAL ORDNANCE USAGE	.18
	a. b. c.	Chronological Site Summary Review of HTRW Related Records Interviews with Site Related Personnel	
5.	SITE	E ELIGIBILITY	. 33
		Confirmed Formerly Used Defense Sites Potential Formerly Used Defense Sites	`

	6.	VISUAL SITE INSPECTION	
•		a. General Procedures and Safety b. Area A: Refuse Trench Dump and Burn Area c. Area B: POW Delousing Area d. Area C: Radioactive Material Storage Building e. Area D: Maintenance Shop Area f. Area E: Drainage Ditches g. Area F: Ineligible Lands h. Area G: Remaining Lands	
	7.	EVALUATION OF HTRW HAZARDS	
		a. General Procedures b. Area A: Refuse Trench Dump and Burn Area c. Area B: POW Delousing Area d. Area C: Radioactive Material Storage Area e. Area D: Maintenance Shop Area f. Area E: Drainage Ditches g. Area F: Ineligible Lands h. Area G: Remaining Lands	
	8.	SITE HTRW TECHNICAL DATA40	
	9.	EVALUATION OF OTHER ENVIRONMENTAL HAZARDS41	
		<ul><li>a. Ordnance and Explosives</li><li>b. Building Demolition/Debris Removal</li></ul>	
		APPENDICES	
	F. G. H. J. K. L.	REFERENCE SOURCES REFERENCES AND ABSTRACTS GLOSSARY TEXTS/MANUALS REPORTS/STUDIES LETTERS/MEMORANDUMS/MISCELLANEOUS ITEMS REAL ESTATE DOCUMENTS NEWSPAPERS/JOURNALS INTERVIEWS PRESENT SITE PHOTOGRAPHS HISTORICAL PHOTOGRAPHS REFERENCE MAPS/DRAWINGS ARCHIVES SEARCH REPORT CORRESPONDENCE REPORT DISTRIBUTION LIST	
			·

## REPORT PLATES

- 1. SITE MAP
- 2. DEPOT LAYOUT CIRCA 1942 TO 1961
- 3. PROJECT AREAS
- 4. OWNERSHIP 1998
- 5. PHOTO LOCATIONS

## **TABLES**

- 2-1 DERP FUDS PRELIMINARY ASSESSMENT PROJECTS
- 2-2 JANUARY 1998 SOIL AND WATER SAMPLING RESULTS RIVER VALLEY SCHOOLS
- 3-1 LAND USAGE
- 3-2 CURRENT LAND OWNERS OF MARION ENGINEER DEPOT
- 3-3 NATURAL AND CULTURAL RESOURCES
- 4-1 LAND ACQUISITION OF MARION ENGINEER DEPOT
- 8-1 HAZARDOUS MATERIALS/CHEMICAL COMPOUNDS USED AT MED

## HAZARDOUS, TOXIC AND RADIOLOGICAL WASTE ARCHIVES SEARCH REPORT FOR

## MARION ENGINEER DEPOT MARION COUNTY, OHIO PROJECT NUMBER G050H015003

## 1. INTRODUCTION

### a. Subject and Purpose

- (1) This report presents the findings of an historical records search and site inspection for hazardous, toxic and radiological waste (HTRW) located at the former Marion Engineer Depot (MED), Marion, Ohio (see plate 1 for general location map). The investigation was performed under the authority of the Defense Environmental Restoration Program for Formerly Used Defense Sites (DERP FUDS).
- (2) This investigation focused on 653.18 acres of land that were used by the Army from 1942 to 1961 for the receipt, maintenance, storage and issuance of general supplies and engineer stocks and equipment.
- (3) The purpose of this investigation was to characterize the site for potential HTRW presence. This investigation was conducted by experienced hazardous waste experts through thorough evaluation of historical records, interviews and on-site visual inspection results.

### b. Scope

This report presents the site history, site description, real estate owner information, and confirmed HTRW presence, based on available records, interviews, site inspections and analyses. It further provides a complete evaluation of all information to assess potential HTRW presence where an HTRW presence has not been confirmed.

## 2. PREVIOUS INVESTIGATIONS

## a. 1991 Preliminary Assessment

(1) A Preliminary Assessment of Marion Engineer Depot was conducted under DERP FUDS by the U.S. Army Corps of Engineers, Huntington District (see document E-1). At that time, the Findings and Determination of Eligibility

(FDE), dated 12 June 1992, concluded that the site had been formerly used by the Department of Defense.

(2) The original preliminary assessment was revised on 3 September 1997 by Louisville District, Corps of Engineers, to address additional areas of concern discovered during a site visit in August 1997. The revised preliminary assessment concluded that there were eligible categories of hazards under the DERP FUDS program. Table 2-1 summarizes the projects recommended in the preliminary assessment.

TABLE 2-1						
r	ERP-FUDS P	RELIMINARY	ASSESSMENT P	ROJECTS		
Project Number	DERP Category	Present Phase	Comments	Location		
G05OH015002	CON HTRW	unknown	Underground storage tanks	Various locations throughout site		
G050H015003	HTRW	SI	HTRW presence	Entire site		
G050H015004	BD/DR	unknown	Asbestos removal	Dumped in locations over 94 acres		

## b. Other Previous Investigations

#### (1) 1990 Environmental Assessment

- (a) At the request of Graham Investment Company/G.P. Properties, ERM-Midwest, Inc., of Columbus, Ohio, conducted an environmental assessment (EA) of MED. A report titled Report on the Environmental Assessment of Former Marion Engineer Depot, Marion, Ohio, dated June 1990, summarizes actions taken by ERM-Midwest, Inc. and their conclusions and recommendations (reference B-4).
- (b) The objective of the EA was to assess the potential presence or absence of contaminants in the form of hazardous substances. The scope of the EA included compiling a site history emphasizing on-site chemical substances, reviewing regulatory agency documents, inspecting the property for indications of contamination and reporting conclusions and recommendations.
- (c) On 11 April 1990, ERM collected seven surface water samples from open channels and storm sewers associated with the site. All seven samples were tested for metals and benzene, toluene, ethylbenzene and xylenes (BTEX). One sample was additionally tested for commonly

encountered polychlorinated byphenyls (PCBs). One sample indicated lead and cadmium at levels slightly above Ohio water quality standards for surface water. Arsenic was also detected in the same sample below the surface water quality standard level. ERM did not determine the source of the metals, but did not consider the level of metals to be unusual for industrial areas or to pose any serious risks.

- (d) The on-site investigation was performed by ERM on 21-24 May 1990. Discoveries by ERM during the investigation included several underground storage tanks (USTs) and above ground storage tanks (ASTs), PCB containing transformers, a waste storage area and radioactive material (a Radium 226 check source for calibrating dosimeters) in building 106.
- (e) In this report, ERM did not identify any significant, adverse environmental conditions at MED. The report concluded that no significant environmental conditions exist that would negatively impact property transactions, but that issues of concern (USTs, AGTs, PCB transformers, waste storage area and radioactive material) needed to be addressed by the parties involved. ERM further recommended ways of managing the UST, AGT, PCB transformer, waste storage area and radioactive material problems.

## (2) 1991 Environmental Audit

- (a) In May and June 1990, Howard K. Bell, Consulting Engineers, Inc. of Lexington, Kentucky, conducted and environmental audit of the Pennington U.S. Army Reserve Center on Harding Highway. This audit was done at the request of the Fort Knox Directorate of Engineering and Housing (DEH) office. The results of the audit were presented in a report titled Environmental Audit of Pennington U.S. Army Reserve Center, dated January 1991 (reference B-5).
- (b) The intent of the audit was to identify obvious areas of environmental non-compliance and/or contamination. The scope of the audit included the completion of a broad environmental survey and an on-site visual inspection. No environmental sampling or monitoring was performed during the audit.
- (c) Areas of concern addressed in the audit included two (2) abandoned USTs, asbestos in the Reserve Center, presence of transformers with PCBs, maintenance of the oil/water separator and waste oil/solvent disposal. The audit recommended closure of the USTs, a survey to determine

asbestos and PCB presence, proper maintenance of the oil/water separator and better control and verification procedures for waste oil/solvent disposal.

(d) It should be noted that this study was conducted on an area of MED that is currently ineligible for DERP FUDS. Because the area concerned is currently under the control of and used by the Army Reserves, any remedial actions taken would come under the Installation Restoration Program (DERP IRP). The audit was included in this report as an indication of the presence or non-presence of hazardous materials within the entire former MED boundary.

## (3) 1991 Environmental Assessment Update

- (a) In August 1991, ERM produced a report in letter form with the purpose of updating the recommendations made by ERM in the original June 1990 environmental assessment (reference B-6). The scope of this project was to reiterate the ERM recommendations and discuss the actions taken by Graham Investment Company/G.P. Properties.
- (b) ERM representatives visited MED on 23 July 1991 to update the previous site assessment. At that time, ERM learned the Graham Investment Company/G.P. Properties had removed all USTs, removed the PCB transformers, discontinued uncontrolled dumping and cleaned the waste storage area and disposed of the radioactive check sources. ERM concluded that based on available information at that time and their professional expertise, under current State and Federal regulations, all recommendations made by ERM during the environmental assessment had been fulfilled.

#### (4) 1996 Environmental Baseline Study

- (a) On 5 December 1995, JAYCOR Environmental conducted an Environmental Baseline Study (EBS) of the Marion Outdoor Training Area (MOTA) for the 88<sup>th</sup> Regional Support Command (RSC) of the U.S. Army Reserves. This property consists of approximately 124.5 acres of land on the southern boundaries of MED listed as being owned by the Governmental Services Administration (GSA). The August 1996 reported titled Environmental Baseline Survey (EBS), Marion Outdoor Training Area (OTA), Marion, Ohio, presents JAYCOR's conclusions and recommendations (reference B-7).
- (b) The purpose of the EBS was to determine the previous ownership and past uses of the property and to assess the site for hazardous materials and contaminants within the scope of environmental regulations. The

objective of the survey was to identify any and all areas of concern regarding environmental regulations and document potential findings and their sources.

- (c) JAYCOR recognized several potential environmental concerns on the property. Most of the concerns focused on unidentified abandoned drums, asbestos, construction debris and railroad pilings. However, they concluded that no serious environmental threats were identified that required immediate attention. It was recommended that areas identified as potential concerns (drums, asbestos, etc.) should be further investigated and resolved if appropriate.
- (d) It should be noted that this study was conducted on an area of MED that is currently ineligible for DERP FUDS. Because the area concerned is currently under the control of and used by DOD, any remedial actions taken would come under DERP IRP. The study was included in this report as an indication of the presence or non-presence of hazardous materials within the entire former MED boundary.

## (5) 1997 Radiological Screening Survey

- (a) From 20 to 22 August 1997, the Ohio Department of Health, Bureau of Radiological Protection, conducted a radiological survey at the River Valley Local Schools (see document E-2). The purpose of the survey was to determine if radioactive materials were present in the middle school, high school or on school grounds.
- (b) Four different models of detectors were used during the survey to ensure accurate readings. The survey inside the buildings focused on classrooms and other areas where students may congregate. Outside the buildings, the survey focused on areas such as the athletic fields, areas of other outside activity and the nature preserve walking trails.
- (c) During the conduct of the survey, a radiation source was discovered in the yard in front of the high school. This area was marked with spray paint for further investigation. Also, a box containing a radium 226 source was found in a high school classroom. The source was removed from the classroom and placed in a locked storage room. All other areas screened for radiation were within background levels.
- (d) Based on these findings, the Director of Health issued an adjudication order to the school

Superintendent directing the school administration to remove or license the radium 226 source and to ensure removal of the radiation source in the school front yard.

## (6) 1997 Leukemia Mortality Study

- (a) On 17 October 1997, the Ohio Department of Health released a study entitled Leukemia Mortality Among Residents of Marion, Ohio, 1966-1995 (reference B-8). The objectives of the study were to complete an analysis of mortality for three (3) ten year time periods and to map leukemia deaths in order to determine any unusual patterns of cases.
- (b) Data was collected for population, deaths due to leukemia and geographic location of residence at the time of death. The data was further broken down into three (3) study populations; "Marion County", "City of Marion" and "Remainder of Marion County".
- (c) The study concluded that the leukemia mortality rate for the "City of Marion" is higher than the "Remainder of Marion County" and the State of Ohio for the years 1986 to 1995. In fact, the leukemia mortality rate for the "City of Marion" has increased 122% over the past 30 years while rates for "Remainder of Marion County" and the State of Ohio have decreased by 30% and 8%, respectively. It was noted that environmental carcinogens, including radioactive substances and hazardous chemicals, may be playing a role in the occurrence of leukemia in the area.
- (d) The following recommendations were made in the study: 1) Test any private wells at residences of leukemia decedents for radiological and hazardous chemical presence, 2) Assess the potential for hazardous levels of radiological constituents and hazardous chemicals in the local aquifer, 3) The Ohio Department of Health review any test results from MED or River Valley School grounds for implications of radiological or hazardous chemical exposures to the public, 4) The Ohio Department of Health complete an assessment of probable radiological contamination on private property formerly owned by MED and 5) Conduct additional epidemiological studies of newly diagnosed cases of leukemia in the Marion area.
- (e) The study also strongly noted that results of environmental sampling will not show causation for any of the leukemia cases. Any results will, however, be helpful in assessing any current risks from environmental carcinogens.

- (7) 1997 Radiological Characterization Study
- (a) In light of the radioactive material discovered during the July 1997 radiological survey of the River Valley School grounds, the Ohio Department of Health, Bureau of Radiation Protection, expanded the study to include a radiological characterization study of Building 517 of MED. The study was conducted on 30 and 31 October 1997 and a report entitled Radiological Characterization Study of Building 517 (Formerly Marion Engineering Depot) summarizing the results of the study was subsequently released (see document E-3).
- The objective of the study was to determine if fixed and/or loose radioactive material was still present in the building and to determine if radium 226 was present in the surrounding soils. The study included surface scans, soil samples, direct radiation measurements and smears. Surface scan readings were made for alpha, beta The entire radiological and gamma radiation. characterization study compiled 433 measurements and/or samples. Inside Building 517, 71 surface smears, six (6) control smears, eight (8) direct radiation measurements, 78 gamma surface scans, 69 alpha surface scans, 126 beta surface scans and two (2) pipe samples were taken. Outside the building, 38 direct radiation measurements, 28 gamma surface scans and seven (7) soil samples were taken.
- (c) The study concluded that Building 517 has fixed alpha and beta contamination in excess of background that appears to be embedded mostly in the floor and the first two (2) feet below the watermark on each wall. Three radionuclides that may account for the high alpha and beta activity inside the building are lead 210 (radium D), bismuth 210 (radium E) and polonium 210 (radium F). Two soil samples outside the building showed slightly higher than normal radium 226 levels. No gamma radiation was detected during the survey.
- (d) It was hypothesized that the contamination detected during the survey did not occur during storage of equipment with radium 226. Rather, it was the result of radon gases emanating from the radium 226. The radon then decayed into the three (3) aforementioned radionuclides, a process which produces alpha and beta radiation.
- (e) The Ohio Department of Health, Bureau of Radiation Protection, recommended that the Army Corps of Engineers specifically identify, by radionuclide, the fixed

alpha and beta activity inside Building 517. They also recommended examination of the soils directly beneath the building for radioactivity.

- (8) 1997 Radiological Removal Action Final Report
- (a) Based on the findings of the August 1997 Radiological Screening Survey (document E-2), the Corps of Engineers, Tulsa District, conducted a radiation survey and removal action of a radiation source at River Valley High School on 15-17 September 1997. The results of that action were published in a 25 November 1997 report titled Radiation Survey No. USACESWT-SO-R1-09-97, Quick Response Radiological Removal Action Final Report, River Valley High School, 15-17 November 1997 (reference B-9).
- (b) The purpose of the survey and removal action was to comply with a removal order issued by the State of Ohio, protect the general public from the radiological contamination and safely remove, package, transport, store and dispose of unwanted radioactive material.
- (c) The radiation source was determined to be within a 0.4 square meter area of the front lawn of River Valley High School. On 16 September 1997, the source, a dime sized marker containing radium 226, was removed and transported for disposal. Soil samples were taken from the excavation area for laboratory analysis.
- (d) The report concluded that removal of the source reduced the external exposure rate to a level indistinguishable from background. It also concluded that the remaining activity in the soil did not pose a health risk. Therefore, it was recommended that no further action was necessary unless future surveys identify other areas of radiological contamination.
  - (9) 1997 Interim Report for River Valley Schools
- (a) From November to December 1997, Lawhon and Associates, Inc., of Westerville, Ohio conducted an intensive environmental investigation of the River Valley Schools property. This investigation was done for the Ohio Environmental Protection Agency (OEPA). The procedures followed during the investigation were submitted to the OEPA in a 19 December 1997 report tilted Interim Report, River Valley Local Schools, Marion (reference B-10).

.

the site, it is recommended that the Ohio Department of Natural Resources be contacted for an up-to-date listing of protected wildlife species (see Appendix A).

## g. Historical/Cultural Resources

- (1) The site inspection team reviewed the records of historical, cultural and archaeological sites in Marion County at the Ohio Historic Preservation Office. No historical, cultural or archaeological sites were found to exist within MED boundaries. However, several small isolated archaeological sites were located just north of MED. Therefore, it is possible that undisturbed areas within MED boundaries could potentially produce archaeological finds. The historical and cultural resources for the site are located in Table 3-3.
- (2) In the event of remediation on the site, it is recommended that the SHPO be contacted for a current re-evaluation of site conditions and remediation guidelines. (see Appendix A).

	1. Sec. 1. 1. 1. 1. 1. 1. 1. 1. 1. 1. 1. 1. 1.	TABLE 3-3 AND CULTURAL	RESOURCES
Resource Classification	Type		Comment
Natural	(None	identified)	
Historical	(None	identified)	
Cultural	(None	identified)	
Archaeological	(None	identified)	Several small sites located just north of the depot

#### 4. HISTORICAL HAZARDOUS SUBSTANCE USAGE

#### a. Chronological Site Summary

#### (1) Prior to 1942

Prior to 1942, the area later to become the Marion Engineer land was primarily farmland. Because the land was used for farming, it is anticipated that pesticides and herbicides would have been used to protect the crops.

There is no indication that any industrial type operations were conducted at the site prior to 1942.

## (2) 1942 to June 1962

## (a) Site Acquisition

On 22 April 1942, the Corps of Engineers, Ohio River Division, received authorization to build an engineer depot in the vicinity of Marion, Ohio (see documents D-1 and F-12). In May 1942, the War Department contacted several Marion farmers regarding the acquisition of their land to build the depot. Using eminent domain, the government gave the farmers an early June 1942 deadline to vacate the land and subsequently acquired 638.78 acres of land (see documents D-1 and L-1). Between 1942 and 1947, an additional 14.40 acres were acquired through transfer, lease and easement (see document L-9). This brought the total amount of land acquired for the depot to be 653.18 acres. Table 4-1 summarizes the land acquisition for the depot.

LAND ACQUISITION OF MARION ENGINEER DEPOT  Date MED Tract						
Original Owner	Method	Acquired	Number	Acres		
Barbara O. Waite	Fee	June 1942	3	57.37		
Nellie R. Holverstott, et al	Fee	June 1942	4	36.12		
Burton E. Earl, et al	Fee	June 1942	5	6.24		
Thomas N. Fisher	Fee	June 1942	8	73.65		
Wilda E. and William C. Fulton	Fee	June 1942	9	1.80		
Santford Seckel	Fee	June 1942	10	99.00		
Emery E. Seckel	Fee	June 1942	11	116.85		
John Baldinger	Fee	June 1942	12	51.80		
Lois E. Baldinger	Fee	June 1942	13	76.60		
Howard Clay Smith	Fee	June 1942	14	95.50		
Lula I. Burt Holden	Fee	June 1942	15	23.85		
Scioto Ordnance Works	Fee reassigned	9 Jul 47	A	7.00		
James O. Seckel	Easement	2 May 42	1-E	0.45		

TABLE 4-1					
LAND ACQUISITION	OF MARION	ENGINEER DE	EPOT (Conti	nued)	
Original Owner	Method	Date Acquired	MED Tract Number	Acres	
Allen George	Lease	unknown	16	1.60	
Frank J. Mautz	Lease	unknown	17	.0.75	
Walter E. Fetter, et ux	Lease	unknown	18	1.50	
Chester K. Gruber	Lease	unknown	19	1.60	
John T. Gruber	Lease	unknown	20	1.50	
Scioto Ordnance Works	License reassigned	12 Sep 48	В	None	
N.Y.C. R.R. Co.	License	unknown	1-L	None	
State of Ohio; Department of Highways	License	unknown	2-L	None	
Erie R.R. Co.	License	unknown	3~L	None	
Claridon Twp Trustees	License	unknown	4-L	None	
State of Ohio; Department of Highways	License	unknown	5-L	None	
Erie R.R. Co.	License	unknown	6-L	None	
N.Y.C. R.R. Co.	License	unknown	7-L	None	

## (b) Depot Construction

(1) Construction of the depot began on 11 June 1942 (see document D-1). While under construction, the depot underwent several name changes. The site was initially under the command of the General Depot Service and was designated as the Marion War Aid Depot on 7 May 1942. On 7 August 1942, the depot was redesignated as the Marion Quartermaster Depot. The depot then came under the control of the Chief of Engineers and was renamed Marion Engineer Depot effective 20 August 1942 (see document F-16). The local newspaper also once called the site the Marion Holding and Reconsignment Depot (see document D-1), but there is no historical documentation that uses this name.

(2) The depot was constructed mainly by civilian contractors using a civilian work force from the immediate area. However, from 23 August to 30 November 1942, the  $2^{nd}$  Battalion,  $333^{rd}$  Engineer Regiment constructed railroad lines at MED for training purposes (see documents D-1, H-1 and H-2). The depot was basically laid out with

four (4) avenues, six (6) streets and 22 miles of railroad (see document D-1). It had five (5) large warehouses, three (3) open sheds, a maintenance area and a headquarters area (see documents L-2, L-3 and L-10). Marion Engineer Depot officially began operation on 1 September 1942 and was dedicated on 7 December 1942 (see documents D-1 and F-1). It was the largest facility of its kind in the United States at that time.

## (c) Missions

- (1) When the depot officially began operation, its mission was to be a key and reserve depot for items of engineer supplies and equipment and conduct fourth and fifth echelon level repairs on heavy engineer equipment (see document F-3). They were also responsible for the storage of Army Air Forces (AAF) equipment. In order to accomplish this, the depot's work force was divided into seven (7) sections; security, transportation, maintenance, warehouse and shipments, salvage, AAF storage and post engineer (see document F-2).
- (2) MED's mission changed throughout the years as the needs of the Army changed. In February 1946, the mission was to receive, identify, classify and segregate returned engineer supplies and equipment; to operate fourth and fifth echelon repair of returned heavy engineer equipment; to declare and ship surplus property to disposal agencies; and to ship items on requisition from the Chief of Engineer and the Treasury Department (see document F-3). In 1948, the depot mission changed slightly to show that the depot came under the 2<sup>nd</sup> Army, and it stocked Treasury Department strategic materials (see document F-4 and F-5). Document F-6 gives detailed responsibilities for each section at MED as of 1 July 1949.
- (3) During the Korean conflict, the depot mission was not changed in any major ways, but the sizes of the tasks expanded greatly. Rehabilitation of Bailey bridges and rebuilding of heavy equipment were two tasks that expanded tremendously during the Korean conflict (see document F-11). Overall, the tonnage handled by MED increased six (6) to nine (9) times (see document F-12).
- (4) After the Korean conflict, the mission of the depot changed somewhat. From November 1954 to September 1955, the mission to distribute nonbinnable repair parts for the First, Second and Fifth Army Area was transferred from Columbus General Depot to MED. In November 1957, the mission to distribute general engineer supply

items for the Second Army Area and the Military District of Washington was transferred from MED to Belle Mead General Depot: Lastly, in January 1959, MED was selected as the Corps of Engineer's Assembly Depot for Nike missile equipment being shipped to allies in conjunction with their unit training in the United States (see document F-12).

## (d) Depot Work Force

The work force at MED consisted of both civilian and military personnel, with civilian personnel making up the bulk of the force. Peak employment at the depot was 1,478 civilian and 47 military personnel in July 1947 (see documents D-1 and F-12). After WWII ended, personnel strength dropped dramatically to 626 civilian and 11 military in March 1946 (see document F-12). The number of workers continued to drop until the outbreak of the Korean conflict, when the work force doubled by Spring of 1951 (see document F-11). Available documentation does not indicate the size of the MED work force from after the Korean conflict to closing in 1961.

#### (e) Depot Operations

- (1) The mission related operations conducted at MED can be broken down into three (3) major groupings; 1) Receiving, storing and shipping,
  2) Maintenance, and 3) Care and preservation. Marion Engineer Depot stored numerous items including heavy equipment (cranes, trucks, scrapers, generators, etc.), repair parts for the heavy equipment, various other pieces of equipment, Bailey bridges, cryogenic cylinders, gas cylinders, raw bulk materials and ores (rubber, tannin, molybdenum), and radioactive metascopes and bridge/road markers (see documents D-1 and F-9).
- (2) Maintenance was conducted on the heavy engineer equipment at fourth and fifth echelon levels. Typical operations at the depot maintenance shops included steam cleaning, degreasing, assembly/disassembly, sandblasting, paint stripping and painting.
- (3) Care and preservation operations were conducted to keep the stored equipment in good working order until the equipment was shipped back out. Typical operations included cleaning, stripping of cosmoline, degreasing, draining vehicles of oil and gasoline, oiling/lubricating, and painting.

- (4) Available documentation does not indicate hazardous substances were used or hazardous wastes were produced during receiving, storing and shipping operations. Maintenance operations would have typically utilized solvents, paint thinners/strippers and lead based paints. Typical wastes from maintenance operations would have included solvent sludge, sandblasting residue, paint residue, and steam cleaning residue. Care and preservation operations also would have utilized solvents and lead based paints. Wastes from care and preservation operations would have typically included waste oil and gasoline, solvent sludge, paint residue and lubricating oil residue.
- (5) There is no historical documentation specifically describing the procedures for disposal of hazardous substances or hazardous wastes. Common practice at the time was to bury or burn them, and it appears MED followed this practice. According to several former MED employees, a large burn pit was located on the east side of MED, where the River Valley High School athletic fields exist today. The burn pit was believed to have been constructed some time in 1951 or 1952. The actual size of the pit is somewhat in dispute, but its use is not. It appears that it was common practice to dump waste oil and gasoline into the pit and burn it with other debris. One former employee estimated that he burned 1,000 gallons of gasoline and 750 gallons of oil anywhere from once a month to once a week from 1953 to 1961. It is anticipated that solvent sludges, paints, paint thinners and other substances from the entire depot were also burned in this pit (see documents I-1, I-5, I-7, I-10, K-1 and K-2). However, the exact types and amounts of hazardous substances and/or hazardous wastes dumped and burned in the pit is unknown at this time.
- Chemical, Biological and Radiological (CBR) team composed of volunteers from the MED work force. The CBR team conducted such operations as, establish safety guidelines in CBR matters, transfer and monitor radioactive items, issue film badges and keep various records. The team was mainly concerned with radiation and how to react to a nuclear attack. As such, the team members received training on CBR subjects with emphasis on radiation. The CBR team regularly conducted training on locating radiation by hiding a radioactive cobalt source in a lead box and then finding it. This training was conducted only in the depot maintenance area. No radioactive markers were ever used in their training (see documents I-1, I-6 and I -11).

## (f) Cambridge Subdepot

MED had a separate storage area located about 126 miles away in Cambridge, Ohio, and was known as the Cambridge Engineer Subdepot. It was an integral part of MED and operated under MED control and supervision. The subdepot was used mainly to store Bailey bridges, V-type trestle bridges and gas cylinders of all types. During WWII, the subdepot complement was 242 civilians and three (3) military personnel. By March of 1946, that number had been reduced to a total of 40 personnel (see document F-3). Available documentation does not indicate how long the Cambridge Engineer Subdepot was in operation.

## (g) POW Camp

A prisoner of war camp, known as Camp Marion, was located at the east end of MED from 1944 to 1946. Camp Marion was a branch camp for POWs that came under the direction of Camp Perry in Sandusky, Ohio. While most of the POWs were German, there were also some from Italy, France and Czechoslovakia. The greatest number of POWs at Camp Marion at any one time was approximately 300. POWs at Camp Marion performed several tasks at MED such as grass cutting, cleaning up litter, janitorial type work, kitchen work, freight handling, and truck and machinery maintenance. All POWs were removed from Camp Marion on 1 March 1946 (see documents D-1 and F-3).

## (h) Land Disposal Prior to Depot Closure

Prior to the depot's official closure, there were several real estate actions concerning MED land. On 30 June 1955, all the leases along the eastern open ditch, totaling 6.95 acres, were terminated. 8.87 acres were reported excess to GSA on 26 September 1956 and later conveyed to George L. Earl by quitclaim deed on 30 September 1957. On 6 December 1957, 40.70 acres were reported excess This acreage was conveyed by quitclaim deed on 25 July 1958 to the Claridon Local School District, while reserving easements over 2.72 acres. 59.10 acres were reported excess to GSA on 27 March 1961 and conveyed by quitclaim deed to the River Valley Local School District on 18 December 1961. Lastly, 0.45 acres, an easement with seven (7) licenses with no area, were reported excess to GSA on 23 September 1957. However, this acreage was not disposed of until 4 March 1965, when it was transferred by quitclaim deed to the City of Marion (see document G-1).

## (i) Depot Closure

On 5 July 1960, the Secretary of the Army announced that MED would be phased down to a reserve storage activity by 30 June 1961. Most employees, 707, were offered continued employment at other locations, while the remaining 169 positions were being eliminated altogether (see document D-1). Effective 30 June 1961, Marion Engineer Depot was placed in an inactive status and designated as a subdepot of the Columbus General Depot (see document F-16). MED continued limited operations reserving engineer stocks for about a year. On 1 July 1962, MED was discontinued as a Department of the Army installation (see document F-16).

### (3) July 1962 to Present

## (a) Site Disposal

After the depot closed on 1 July 1962, the remaining 537.11 acres were disposed of over a period of nearly five (5) years. On 1 July 1962, two (2) separate disposal actions occurred; 5.34 acres were reassigned to the U.S. Army Reserve Center and 127.10 acres were reassigned to the U.S. Army Reserve Outdoor Training Site. The River Valley School District received 18.63 acres by quitclaim deed on 12 June 1964. The City of Marion was conveyed 21.22 acres by quitclaim deed on 16 July 1964. On 20 August 1964, the Marion County Commissioners were conveyed 15.00 acres by quitclaim deed. On 15 October 1964 and 27 November 1964, GSA conveyed 32.06 acres and 7.00 acres, respectively, by quitclaim deed to the State of Ohio. Effective 23 February 1966, GSA reserved 143.58 acres. 128.00 acres were conveyed by quitclaim deed to the Marion Area Community Improvement Corporation on 9 March 1966. Lastly, GSA conveyed 43.73 acres by quitclaim deed to Raymond P. Park and William Graham, Inc. on 15 April 1967 (see document G-1).

### (b) Known HTRW Use at Site After MED Closure

(1) Little is known about HTRW use at the site by private entities immediately after MED closed. It appears that portions of the depot were leased to local private industries. One company, Greif Brothers Corporation, used an area of the depot to rehabilitate and sell Bailey bridges. According to one of their former employees, the company dumped wastes such as solvents into the eastern open ditch on the site (see document I-13). Other private companies known to use the site after closure include Borden Inc., Otis Wright and Sons Inc. and Nu-Supply Warehouse (see document D-1). Available documentation does

not indicate a total of how many private companies used MED after closure or if these companies utilized and/or disposed of hazardous materials at the site.

- (2) GSA utilized the property reserved to them in 1966 to store two (2) hazardous materials; asbestos and tannin as part of the National Defense Stockpile. Their storage facility, known as the GSA Federal Property Resources Service Marion Depot, stored approximately 4,000 tons of asbestos and 2,000 tons of tannin. Due to deteriorating conditions at the depot, the asbestos and tannin were removed from the site some time between June and October 1986 (see document D-1).
- (3) Patten Construction Company, a subsidiary of HARSCO, occupies a portion of the MED land to rehabilitate scaffolding and construction equipment. According to the current facility manager, they do not generate any HTRW. However, in the past, they were considered a small quantity generator of xylenes, a waste product from their painting operations (see document I-4).

#### (c) Current Use of Site

The current use of the site as well as the current owners of the site are addressed in Section 3.a. of this report. A listing of current owners can also be found at plate 4. At this time, there is no known generation of hazardous wastes by any of the current owners of MED.

#### b. HTRW Records Review

An historical document search was conducted by the site inspection (SI) team to obtain HTRW related records relevant to Marion Engineer Depot. Research sites included, but were not limited to, National and State Archives, state, county and local libraries, historical centers and societies, local newspapers, state, county and local law enforcement agencies and current owners of the site (see appendix A for a complete listing of contacts). All documents obtained were thoroughly reviewed by the SI team. The following documents are important to the verification of real property use by the War Department and the presence or non-presence of HTRW:

(1) A 1987 book entitled The Scioto Ordnance Plant and The Marion Engineer Depot, A Profile After Forty Years, by Charles and Ruth Mosher gives detailed accounts of the history of and activities at MED and contains interviews from several former MED employees (see document D-1).

- (2) Fourteen (14) reports assess the environmental conditions at various locations of MED (references B-4 through B-15 and documents E-2 and E-3). These reports were thoroughly addressed in section 2.b of this report.
- (3) A memorandum, dated 28 August 1942, states MED was constituted and Activated on 1 September 1942 (see document F-1).
- (4) A 31 January 1943 memorandum summarizes some of the activities and operations at MED during its first three months of operation (see document F-2).
- (5) Five (5) memoranda dated between March 1946 and October 1951 summarize the results of annual inspections of MED. Each memorandum states the mission of MED at that particular time (see documents F-3 through F-5, F-7 and F-10).
- (6) A 1 July 1949 brochure from MED outlines the organizational and functional responsibilities of each section at MED (see document F-6).
- (7) A 13 December 1950 memorandum gives the results of a metascope inspection at MED. It states that the metascopes were stored somewhere other than Building 517 at that time. The memo also indicates that many of the metascopes were leaking radon (see document F-8).
- (8) A report of inventory, dated 31 January 1951, lists everything stored at the depot supply at that time (see document F-9).
- (9) A memorandum, dated 26 October 1951, describes the changes in mission for MED as a result of the Korean conflict (see document F-11).
- (10) A brochure from circa 1953 or 1954 contains the history, mission and operating capabilities of the depot. The brochure also includes a map and several photographs of MED (see document F-12).
- (11) Three (3) separate MED operating procedures from 1957 and 1958 establish standard procedures to be used at the deport for ionizing radiation exposure, disposal of industrial waste materials and petroleum products (see documents F-13 through F-15).

- (12) An Historical Data Card, circa 1960s, lists a limited history of Marion Engineer Depot (see document F-16).
- (13) A 7 October 1968 Realty Control File Summary lists all the disposal actions for MED land (see document G-1).
- (14) Two (2) newspaper articles, dated 4 and 9 September 1942, show photos of the construction of MED. They also describe what the  $2^{nd}$  Battalion,  $333^{rd}$  Engineer Regiment did during the construction of the depot (see documents H-1 and H-2).
- (15) Fourteen (14) newspaper articles, dated between 20 August 1997 and 8 April 1998, recount some the recent environmental investigations conducted at River Valley Schools. These articles correspond to reports addressed in section 2.b of this report (see documents H-3 through H-16).
- (16) A 15 May 1951 aerial photo of MED clearly shows excavation activities in the vicinity of the reputed location of burning trenches. It also shows the maintenance shop area, storage areas and the drainage ditches (see documents K-1 and K-2)
- (17) Two (2) modern era aerial photos, dated 9 April 1988 and August 1996, indicate the present uses of the depot (see documents K-3 and K-4).
- (18) Five (5) historical photos from the 1940s or 1950s show scenes of everyday operations at MED (see documents K-5 through K-9).
- (19) A map dated, 29 April 1942, lists the original owners of the site and the acreage acquired from each (see document L-1).
- (20) Seven (7) maps, dated from 1946 to 1958, show the layout of Marion Engineer Depot, to include building description, roads, sewers, storm drains, and railroad lines (see documents L-2 through L-8).
- (21) A 11 April 1961 real estate map of MED lists the original owners of MED land as well as the location of the transferred, leased and easement land (see document L-9).

- (2) Area B currently is the outlying northern area of the River Valley High School grounds, near the athletic fields (see photo J-10). The railroad spur that once existed in the area is gone, being replaced by a blacktop road.
- (3) No direct visual evidence of an HTRW presence in Area B was noted by the SI team during the site inspection.

## d. Area C: Radioactive Material Storage Building

- (1) Area C consists of 0.10 acres and is the site of Building 517, which was used by MED to store radioactive material (see plate 3). Historical documentation indicates metascopes containing low levels of radium 226 were stored there. It is also known that many of these metascopes were leaking the radioactive gas radon while being stored there. Former MED employees indicate 50 to 60 thousand radioactive road markers were also stored there.
- (2) Currently, Area C is an abandoned concrete building (Building 517) with a barbed wire fence around it. The fence has a locked gate with a sign warning of radiation denying access to the building itself (see photos J-11 and J-12). The area surrounding the building is overgrown with thick vegetation. Access to the area is by foot and only after crossing a large open drainage ditch and walking through woods.
- (3) Because of the fence and locked gate, the SI team could not directly inspect Building 517. Also, the SI team did not have a radiac meter to determine the presence of radiation. No direct visual evidence of an HTRW presence in Area C was noted by the SI team during the site inspection.

#### e. Area D: Maintenance Shop Area

- (1) Area D consists of 7.00 acres and is located near the center of the depot (see plate 3). Historical documentation shows that this area was the former location of the depot level maintenance shops. Operations conducted there included steam cleaning, degreasing with solvents, generator cleaning and repair and storage of maintenance materials.
- (2) Currently, Area D is owned by HARSCO and is operated by one of their subsidiaries, Patten Construction Company. Patten Construction Company rehabilitates

## d. Area C: Radioactive Material Storage Building

Area C is considered to have a **confirmed** HTRW presence because a recent radiological survey of Building 517 concluded that the building contained fixed alpha and beta radioactive activity. Building 517 was historically known to store radioactive metascopes. These metascopes were known to be leaking the radioactive gas radon. The Ohio Department of Health, who surveyed the building, hypothesized that the radon from the metascopes is responsible for the alpha and beta activity that remains today.

#### e. Area D: Maintenance Shop Area

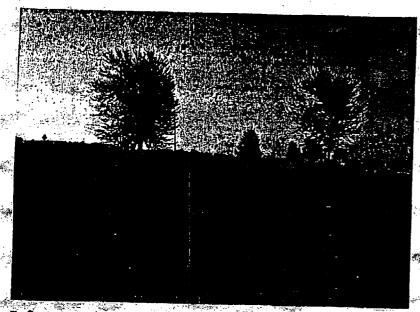
Area D is considered to have a **potential** HTRW presence because there is no verifiable historical or direct scientific evidence to confirm an HTRW presence. Because it is known that operations such as steam cleaning, degreasing and hazardous material storage historically occurred in the area, it is possible that an HTRW presence resulting from these operations in the form of solvents, petroleum product components and lead from paints remains there today. However, no environmental studies of the area are available to confirm or deny an HTRW presence.

## f. Area E: Drainage Ditches

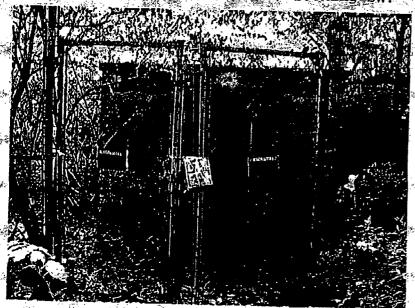
Area E is considered to have a **potential** HTRW presence because there is no verifiable historical or direct scientific evidence to confirm an HTRW presence. Common practice at MED included the washing of residue from steam cleaning, degreasing and sand blasting into the open drainage ditches. Because of this, it is possible that solvents, petroleum product components and lead from paints are present today in the water and sediments of the ditches. However, no environmental studies of the ditches are available to confirm or deny any HTRW presence.

## g. Area F: Ineligible Lands

Area F was not evaluated for HTRW presence because the area is not eligible for cleanup under DERP FUDS. Since Area F is owned and/or operated by the Department of Defense, any investigation into an HTRW presence and any resulting cleanup action in the area should come under DERP IRP.



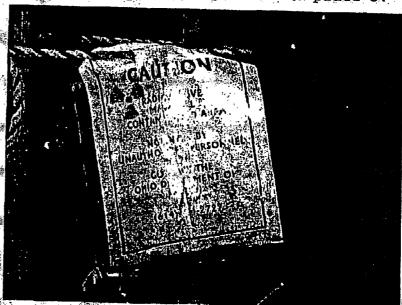
J-9 Area G: Front lawn of high school where radioactive marker was found; looking SW:



J=11 Area C: Entrance on north side of bldg 517; looking south; see plate 5.



J-10 Area B: Area with arsenic presence north of high school; looking WSW; see plate 5.



J-12 Area C: Ohio Dept of Health sign warning of a radiation presence in bldg 517.

(22) A large undated and untitled map lists the buildings at MED as well as their type of construction and floor plan numbers (see document L-10).

#### C. Interviews with Site Related Personnel

- (1) Mr. Robert Ferguson worked at MED for 13 years as a member of the fire department from 1948 to 1955 and as Safety Director until closing in 1961. Mr. Ferguson was a wealth of information on every aspect of operations at Marion Engineer Depot. He knew of the depot's mission, storage and maintenance operations and all the different items stored at the depot. Most importantly, Mr. Ferguson was very familiar with large burn pits formerly located where the athletic fields for River Valley High School are today. He stated that all kinds of debris including cables, building debris, sludges and general trash were burned with waste gasoline and oil. He believed that TCE/PCE sludge from maintenance operations were also burned there (see document I-1).
- (2) Mr. Ted Graham, owner of about 181.43 acres of MED property, stated that a Phase I Environmental Assessment has been completed for his property. A copy of the assessment was supplied to the SI team. As a result of the assessment, Mr. Graham had all USTs and PCB containing transformers removed from his property. To the best of his knowledge, there are no remaining environmental hazards on property owned by Graham Investment Company or G.P. Properties, Incorporated (see document I-2).
- (3) Mr. Roger Axhelm, the supervisor of buildings and grounds for River Valley School District, has been working for the school district since 1988. He also attended River Valley High School in 1961 and 1962. Mr. Axthelm stated he was not aware of any areas on school property that showed signs of an HTRW presence. He also stated that POWs were deloused with arsenic based pesticides along a railroad spur that once existed on the north end of the school property (see document I-3).
- (4) Mr. Bob Vennum and Mr. Don Broadwater of Patten Construction Company, represented HARSCO, the current owner of the depot maintenance shop area. Both stated their company has spent much money towards environmental compliance, including removing a UST, installing test wells and cleaning up paint residue from their operations. Today, Patten Construction Company is no longer considered a hazardous waste generator. They also stated that the OEPA

CONVERSATION RECORD	TIME 0900	DATE 14 May 1998				
TYPE X VISIT CONFEREN	CCE TEI	EPHONE INCOMING	ROUTINE NAME/SYMBOL INI			
cation of Visit/Conference: Marion, OH  AME OF PERSON(S) CONTACTED OR IN CONTACT WITH YOU Mr. Robert Ferguson  etc.'	IZATION (Office, dept., b	Ureau, TELEPHONE NO:				
SUBJECT Marion Engineer Depot (MED)						
SUMMARY						
Mr. Ferguson stated he spent 7 years (1948-1955) at the fire department at MED and 5 more years as the Safety Director for MED. As Safety Director, he had a top secret clearance, total unlimited access at the depot, and was a member of the command staff for safety and health issues.  Mr. Ferguson said that while he was at MED, the mission of the depot was the storage and maintenance of engineer equipment. He stated that light and heavy equipment, spare parts, tools were stored there. Other items such as ores, crude rubber, asbestos and tannin were also stored there. Radioactive material such as sniper scopes and bridge markers painted with Radium 226 containing paint were originally stored in warehouses and then in BLDG 517. Mr. Ferguson confidently stated that without a doubt, there was no secret, underground storage facilities at MED. No OE,CWM or combat vehicles of any kind were ever stored at MED. Maintenance operations at MED included degreasing, generator repair, paint stripping and painting. Degreasing operations used TCE and PCE. The sludge was caught in baffles in a large pit. Stripping of paint utilized both solvents and sand blasting. Residue from the sand blasting on the ground was washed down the storm drains.  Mr. Ferguson stated that wastes from the maintenance operations were not shipped out. He knew that at TCE/PCE sludge was put in drums, but was not sure what happened to the drums after that. However, he did know that on the east end of the site, where the POW camp once existed and the athletic fields for RVHS now exist, MED had several large "burn pits". Mr. Ferguson recalled cables, building debris, sludges and general trash being burned in the pits using diesel, gasoline or fuel oil. He also						
recalled a maintenance shop employee told him was trucked to the pits and burned there with the burn pits were used or if everything was burned	he other items.	Mr. Ferguson was n	_			
Mr. Ferguson told the SI team that MED had team established safety guidelines in CBR matte various records. He knew of no accidents or in	ers, issued film	badges, transferred	CBR items and kept			
ACTION REQUIRED						
NAME OF PERSON DOCUMENTING CONVERSATION Christopher J. Churney, Chemical Engineer, CEMVR-ED-DO	SIGNATURE	Chunen	DATE 14 May 1998			
ACTION TAKEN	<del></del>	0				
GNATURE	TITLE		DATE			
CONVI	ERSATION RECO	ORD	OPTIONAL FORM 271 (12-76) DEPARTMENT OF DEFENSE			

has not released an open pit near Building 521 for use (see document I-4).

- (5) Mr. Melvin McKnight worked at MED in Building 510 as a heavy equipment mechanic and blacksmith from 1950 to 1961. He stated that during steam cleaning operations, residue containing oil and dirt would drain into a nearby open ditch. Mr. McKnight believed that TCE was used to clean electrical equipment in Building 515 and that the sludge from the cleaning was burned in the burn pits on the east side of the depot. Lastly, Mr. McKnight described how Bailey bridges were sandblasted and sprayed with a protectant. He believed all residues from these operations were washed into an open ditch.
- (6) Mr. Robert Lowrey worked at MED as a supervisor in the maintenance department for about 15 year until MED closed in 1961. Mr. Lowrey was in charge of painting all the depot buildings as well as a member of the depot CBR team. Mr. Lowrey stated that as part of the CBR team, he had to inspect radioactive metascopes in Building 517. He related an incident where his Geiger counter went "haywire" during an inspection because of high radiation levels. Mr. Lowrey was not aware of activities at the burn pits or how hazardous wastes were disposed of (see document I-6).
- Mr. Howard Tewalt worked in the paint department and processing department at MED from 1953 to 1961. Mr. Tewalt was extremely knowledgeable about painting operations and disposal operations at the burn pits on the east side of MED. Mr. Tewalt stated he painted just about everything kept in storage with a lead based OD green paint. Any residue from painting or sandblasting was simply left on the ground. Mr. Tewalt said that the burn pit was in operation the whole time he was there, and he believed it was first used in 1952. The pit itself was round and about 50 to 60 feet in diameter. Gasoline and oil was collected from vehicles to be stored or repaired at the depot and was stored in a 1,000 gallon and 750 gallon tank, respectively. Mr. Tewalt stated that when these tanks were full, they would be emptied into the pit. Mr. Tewalt himself would then contact the depot fire department for permission to burn the fuel. Burnings would occur anywhere from once a month to once a week, depending on the volume of vehicles received at the depot. He recalled other items being burned in the pit such as pallets, paint buckets, barrels and other Mr. Tewalt did not know if the maintenance shops dumped solvent sludge into the pit, but considered it a possibility (see document I-7).

CONVERSATION RECOR	D	TIME 0900		DATE 14 July 1998		
m on					POLITINE	
TYPE	NIEEDENICE		CD1101		ROUTINE	
VISIT CO	ONFERENCE	X TEL	<u>юнчэ.</u>		NAME/SYMBOL	INI
			<b>  </b>	INCOMING		
eation of Visit/Conference:		(		OUTGOING		
NAME OF PERSON(S) CONTACTED OR IN CONTACT WITH YOU Mr. Bob Lowrey	ORGANIZATIO	N (Office, dept., bu	ertau,	TELEPHONE NO:		
SUBJECT Marion Engineer Depot (MED)				<del></del>		
SUMMARY						,
of the Chemical, Biological and Radiological that he spent a term as president of the Financial As a member of the CBR team, Mr. Lot the team, as was preparing for a nuclear be on the team and they received training duty was to inspect the metascopes in BL encountered more radiation than expected in the building.  Mr. Lowrey recalled that there was one to enter even though he had a high level of was told by someone who worked in the land of the land that the land in the land that the land in the land that the land in	wrey was the attack. He so on CBR sub DG 517. During and that the building on clearance. Houlding that out the burn as benzene, the content of the burn of the burn as benzene, the content of the burn of the bur	d Supervise 2 <sup>nd</sup> in chartated that of the part in Geige the east of the didn'the didn'the didn'the didn'the didn'the dinners, so	sor's arge. 5 or Lov spect r cou end o t rec t war les on olven	Association.  Radiation was to be people on the vrey said that paion, Mr. Lowrey nters went "hay the depot wher all the building to know what the east side of ts, etc. were dun	the main concerdepot were selected to the CBR to said that they wire" when they we he was not allowas stored in the depot. He anped. He stated	n for cted to eam's were owed owrey tere".
Mr. Lowrey recalled a chemical called said that this product is still on the mark Lastly, Mr. Lowrey told of his fights w working at the depot. He was first diagn	et today. ith several d	ifferent ty	pes o	of cancer he has	contracted since	
ACTION REQUIRED					-	
·					•	
NAME OF PERSON ROLL O	7 2.2	u muth si			D.ATE	
NAME OF PERSON DOCUMENTING CONVERSATION Christopher J. Churney, Chemical Engineer, CEMVR-ED-I	1 //	15 len	90	huney	DATE 14 July 1998	
ACTION TAKEN				7)		
ACIDIT FARM						
				•		
	•					
IGNATURE	TITL	Æ			DATE	· .
**************************************	CONVERSAT	ION RECO	ORD		OPTIONAL FORM DEPARTMENT OF	

- (8) Mr. Loren Gast worked as a woodworker in the boxing and crating department of MED from May 1948 to May 1961. He worked in Building 301. He stated other operations such as stripping cosmoline with TCE, steam cleaning and painting were also conducted there. Mr. Gast was unsure what happened to the residues or wastes from these operations. Mr. Gast also remembered unpacking metascopes and storing them in two wooden buildings prior to the construction of Building 517. Both buildings were torn down after Building 517 was built, Mr. Gast said (see document I-8).
- (9) Mr. Don Stevens worked at the depot for about 6 months in 1943 or 1944. He worked as a mechanic and truck driver and was assigned to work on heavy equipment such as Caterpillars. He would also pick up heavy equipment from the east side of the depot from the railroad lines. Mr. Stevens stated he cleaned and degreased the heavy equipment and that the wastes from those operations were collected in barrels. However, he did not know what happened to the barrels once they left the immediate are (see document I-9).
- (10) Mr. Norman Lord worked many jobs at MED from 1944 to 1960. He worked at his last job, a processing equipment operator, for the last 10 years he was there. While working in processing, Mr. Lord regularly used degreasers, strippers, acids and preservatives. He stated that wastes from these operations would be collected in barrels and then hauled away by the motorpool to the dump on the east side of the depot. The dump, as Mr. Lord called it, was where the River Valley school's athletic fields are today. It was larger than a football field and 30 to 40 feet deep. Mr. Lord stated he knew TCE, sludges, cosmoline, strippers, paints and possibly acids were dumped there. also believes it was standard practice for all departments to dump their wastes into the pit. Mr. Lord was unsure if the wastes were burned or not. Lastly, Mr. Lord described the health problems that arose while working at MED from exposure to TCE (see document I-10).
- (11) Mr. Al Davis worked at MED from 1949 to 1961 in a machine shop, in care and preservation and as an inspector of machine tools. Mr. Davis was also the deputy commander of the depot CBR team. Mr. Davis remembered unpacking and storing 50 to 60 thousand radium painted road markers in a warehouse and in Building 517. He also stated that part of the CBR training was to locate a cobalt source that was inside a lead box. Mr. Davis said that the CBR team never used road or bridge markers in their training and all the training occurred in the maintenance area of the

31

CONVERSATION RECORI	)	TIME	DATE		
	·	1310	14 July 1998	. <u> </u>	
TYPE			_	ROUTINE	
visit cor	NFERENCE	X TELEPIION	E NCOMING	NAME/SYMBOL	INI
cation of Visit/Conference:			OUTGOING		
	ORGANIZATION	(Office, dept., bureau,	TELEPHONE NO:		
SUBJECT Marion Engineer Depot (MED)	<u> </u>				<del></del>
SUMMARY					
Mr. Gast worked at MED from May 194 and crating department. He stated that he also conducted in BLDG 301 including str and painting. These operations were also about what happened to the residues from Mr. Gast could not recall any depot polithere was a burn pit in the salvage yard or off and was continually guarded. Mr. Gast used there to be burned.	e worked in E ipping cosmo conducted in the operatio icies regardin the southwe	BLDG 301. Ca bline with trich BLDG 308, ju ns. ag the disposal est end of the d	re and preserval loroethylene (Test east of 301. If of hazardous we epot. He stated	ntion operations CE), steam clea Mr. Gast was un rastes. He believ	were ning sure
Mr. Gast remembered wearing radiatio the metascopes were stored in two wooden	_	-		<del></del>	that
BLDG 517 was constructed. Lastly, Mr. Con radiation because they had to handle the			people in his of	fice received tra	ining
		<del></del>			
ACTION REQUIRED					
·					
NAME OF PERSON DOCUMENTING CONVERSATION Christopher J. Churney, Chemical Engineer, CEMVR-ED-D	o Siona	The Old	huney	DATE 14 July 1998	
ACTION TAKEN		<del></del>	0		
			,		
	<del></del>		<del></del>	<del></del>	
IGNATURE	TITLE	2		DATE	

**CONVERSATION RECORD** 

OPTIONAL FORM 271 (12-76) DEPARTMENT OF DEFENSE

- depot. Mr. Davis regularly worked with solvents and degreasers while working in care and preservation. He believed the wastes were hauled off the depot by a commercial waste disposal service. Mr. Davis believed there were two (2) or three (3) burning areas around the depot for lumber, railroad ties and boxes, but he could not remember where. Lastly, Mr. Davis stated that prior to MED construction, several oil wells once existed in the area (see document I-11).
- (12) COL J. Arthur Hamilton was the Commander of MED from August 1955 to 1958. He said while he was in command, there was nothing in the fields where the schools exist today; only grass. He also said that no dangerous cargo was ever received at the depot. When asked about the reputed burn pit on the east side of the depot, COL Hamilton stated that he did not recall any burn pits being at MED. He also mentioned that he was the kind of commander that "looks in all corners of his post". COL Hamilton stated that all trash (refuse) was disposed of through the county contracted waste disposal service. When asked about hazardous waste disposal, COL Hamilton was unsure about what happened to it. COL Hamilton then stated he was absolutely sure that no hazardous waste was ever buried on MED property and that it would have been disposed IAW local laws and depot regulations (see document I-12).
- (13) Mr. John Tincher worked on MED property for Greif Brothers in the summer of 1963 or 1964. Grief Brothers lease a portion of the depot after it was closed to recondition and sell Bailey bridge parts. Mr. Tincher stated that the bridge parts would be sandblasted outside and painted inside a building with lead based paint. Mr. Tincher also recalled Greif Brothers dumping many barrels of solvent and other hazardous chemicals into the eastern drainage ditch on MED. He said it was a common practice for the barrels to be drained and abandoned into the ditch. Mr. Tincher was also a member of the National Guard unit located on MED for five (5) years. He remembered occasionally seeing abandoned barrels on GSA owned property while training with his Guard unit. Lastly, Mr. Tincher stated that his father died of leukemia in 1973 and that he himself was diagnosed with leukemia in November 1973 (see document I-13.)

	,			
CONVERSATION RECORD	TIME 1430	DATE 15 July 1998		
TYPE			ROUTINE	
VISIT CONFERE	NCE X TELEPH	ONE INCOMING	NAME/SYMBOL INI	
Jeation of Visit/Conference:  AME OF PERSON(S) CONTACTED OR IN CONTACT ORGAN	NIZATION (Office, dept., bureau,	OUTGOING TELEPHONE NO:		
WITH YOU Mr. Al Davis				
SUBJECT Marion Engineer Depot (MED)				
SUMMARY				
Mr. Davis worked at the depot from 1949 to			<del>-</del>	
shop, in care and preservation and as an inspector commander of the depot CBR team.	ctor of machine tools	s. Mr. Davis was	also the deputy	
commander of the depot CBR team.				
As a member of the CBR team, Mr. Davis re		, ,	•	
markers. He stated they were packed 20 to a b				-
markers on the depot. The markers were originary moved to Building 517. Mr. Davis stated that t	-			Old these be USRC?
react to a chemical attack. The team also used			<del>-</del>	Hear ?
of a radioactive source. According to Mr. Davi radioactive bridge or road markers in their tra				7
the depot.				/ road/bridle
While working in the machine shop, Mr. Dav	vie made enare narte	for crones tract	ors and other heavy	markers
equipment. He stated no solvents, degreasers,				
orking in care and preservation, Mr. Davis re		•	•	
Jelieved a local company hauled out the wastes off the depot.	are and pres	ervation and dun	ipea tnem somewnere	
Mr. Davis beliance describe a consequence 2 or 2 learning			1 . 41 h	_
Mr. Davis believes that there were 2 or 3 but railroad ties and boxes. However, he could not	_	•	·	-
he did not know of any areas with a possible H		<b>,</b>		
Lastly, Mr. Davis mentioned that prior to th	e denot being built.	there were severa	l oil wells in the area	
of MED. When he came back to Marion from				
that once existed there were gone.				
ACTION REQUIRED	<del></del>			-
				·
	Lacustin			-
NAME OF PERSON DOCUMENTING CONVERSATION Christopher J. Churney, Chemical Engineer, CEMVR-ED-DO	SIGNATURE	Character 1	DATE 15 July 1998	
ACTION TAKEN	7	0		=
GNATURE	TITLE		DATE	~
CONV	ERSATION RECORD		OPTIONAL FORM 271 (12-76) DEPARTMENT OF DEFENSE	

5

.

# RADIOLOGICAL CHARACTERIZATION STUDY OF BUILDING 517 (Formerly Marion Engineering Depot)

OCTOBER 30-31, 1997

OHIO DEPARTMENT OF HEALTH BUREAU OF RADIATION PROTECTION

#### INTRODUCTION

The Marion Engineering Depot (MED) was a 645 acre military base located in Marion County, Ohio. The site was used to support the storage and renovation of heavy construction machinery, as well as the receipt, storage, and issuance of general supplies for the U.S. Army. The facility was constructed in 1942 and was deactivated in 1961. According to Mosher<sup>1</sup>, radioactive material was stored at the Marion Engineering Depot and the Scioto Ordnance Plant.

One facility at the Marion Engineering Depot that stored radioactive material was Building 517. This building is approximately 38 ft. by 70 ft. with 10.5 inch thick concrete walls and a brick exterior wall. There is only one entrance to this building and there are no windows. The building stored metascopes, markers, and a few compasses containing radium. In 1958, the Army removed the radioactive material and attempted to decontaminate the building. In 1961, the Army returned to Building 517 and attempted a second decontamination.

In July 1997, citizens from the Marion community began noticing a higher incident of cancers among students who had graduated from the River Valley High School. The Ohio Department of Health and the Ohio EPA were requested to investigate the high incident of cancers among the former students of the River Valley High School. The Ohio Cancer Incidence Surveillance System, under the Ohio Department of Health, compared the River Valley High School students to other school-age populations and noted that the number of leukemias were much higher than expected. Other type of cancers did not show any significant difference between those that were expected and those that were observed in a similar population. It is important to note that leukemia can be produced from exposúre to radiation, as well as, toxic chemicals. Based on the higher than expected number of leukemias, the OEPA and ODH initiated further environmental studies.

A radiological scoping survey of the River Valley Local School grounds detected a radium source buried just below the surface of the soils in front of the high school. The source measured 5.0 mR/Hr at the surface. Another radium source and radioactive rocks were also found inside the school. It appears that the radioactive sources detected inside the school were procured from an educational company, whereas the radium source found in the soils appear to be the product of the U.S. Army. These sources were properly removed by the Army Corp. Of Engineers in September 1997.

In light of this incident, the radiological surveillance was expanded to include a characterization study of Building 517, which was the property of the U.S. Army. Building 517 is not located on the River Valley School property. The Ohio Department of Health, Bureau of Radiation Protection was requested to conduct a radiological characterization study of Building 517.

<sup>&</sup>lt;sup>1</sup>. Mosher C.D., Mosher D.R., The Scioto Ordnance Plant and The Marion Engineer Depot of Marion, OH: A Profile After Forty Years, Wauseon, Ohio, Glanz Printing Co. 1987.

#### **OBJECTIVE**

Historical documents indicate that the primary radionuclide stored in Building 517 was Radium 226. At that time, the dose rate outside the 10 inch concrete wall measured 2 mR/Hr and soil samples taken approximately 10 feet from the building indicated beta-gamma activity of approximately 3000 disintegrations per second<sup>2</sup>. According to a later report, that covered the decontamination of Building 517, stated that the most likely contamination would be daughter products of radon; namely Radium D (Pb-210). Radium E (Bi-210), and Radium F (Po-210) in equilibrium<sup>3</sup>.

Therefore, the objective of this characterization study was to determine if fixed and/or loose radioactive material is still present on the surface, and what the exposure rate are from this radioactive material in Building 517. In addition, the objective also included determining if Radium 226 and its daughters are present in the soils above ambient levels around the outside of Building 517.

#### **METHODOLOGY**

A radiological characterization study was conducted on Building 517 and the surrounding area on October 30th and October 31st. The study included surface scans, soil samples, direct radiation measurements, and smears. The surface scans included alpha, beta, and gamma measurements. These readings are recorded in counts per minute (cpm). The field instrument functionality check is documented in Attachment 1.

The facility was divided into a multitude of sections to allow for spatial identification. From wall to wall, the building was divided into sections as a function of the four pillars located inside Building 517. Thus, there were five (5) sections from the front entrance to the back wall, and there were three (3) sections from the left wall (looking into the building from the main entrance) to the right wall. From floor to ceiling, the area was divided into approximately three equal sections. A fold-out diagram is depicted in Attachment 2.

All measurements inside the building, with the exception of direct radiation measurements, were recorded for each section. Measurements taken on the ceiling were limited due to the availability of equipment to assist in reaching the ceiling.

<sup>&</sup>lt;sup>2</sup> Report of Radiological Hygiene Survey No. 3328R81-59/60, from Adam J. Papalski, Colonel, MC Commanding to The Surgeon General, Department of the Army, Washington 25 D.C., dated June 1, 1959.

<sup>&</sup>lt;sup>3</sup> Report of Radiological Hygiene Special Survey No. 3892R63-61, from Adam J. Papalski, Colonel, MC Commanding to The Surgeon General, Attn: MEDPS-PO, Department of the Army Washington 25 D.C., dated April 26-27, 1961

Scan measurements taken inside the building were recorded two ways, 1) the highest average reading was recorded for each section, and 2) any measurement that was significantly larger than the highest average reading was also recorded in that section along with the highest average reading. Smears were taken in each section with the exception of the ceiling and columns.

Soil samples were collected in selected areas. Several soil samples were collected outside the building directly in front of the pipe discharge. Other soil samples were collected around the perimeter of the facility where areas may have been disturbed during operations of Building 517.

Background measurements were taken at Delaware State Park so that measurements from the Building 517 site can be compared to an unaffected area. Background scans and direct radiation measurements were taken inside a residential home to provide some perspective on measurements taken inside Building 517. These values are provided along with the values from Delaware State Park for comparative analysis. Blank smears were used with the active smears taken inside the building. The blank smears served as a background or as a control device.

#### **DISCUSSION OF RESULTS**

The radiological characterization study inside Building 517 resulted in 71 surface smears, 6 control smears, 8 direct radiation measurements, 78 gamma surface scans, 69 alpha surface scans, 126 beta surface scans, and 2 pipe samples. Measurements conducted outside of Building 517 resulted in 38 direct radiation measurements, 28 gamma surface scans, and 7 soil samples. The entire radiological characterization study compiled 433 measurements and/or samples.

Each circle or triangle in Attachment 2 represents the area or boundary of the survey. The triangle represents a more specific location or hot spot. Measurements performed at the triangle location represented the highest reading as reported in Attachment 3. The data, as depicted in Attachment 3, can be compared to Attachment 2 to determine the activity level at that location. Attachment 4 represents only locations (i.e., soil samples) and measurements for gamma activity, that were taken outside and around the perimeter of Building 517. The results are discussed below.

To provide a better orientation of Attachment 2, the following bullets provide a more detailed description:

Standing at the main entrance looking into Building 517

- o To the left, Location Id. 1 thru 15 are along the side wall
- o To the right, Location Id 16 thru 30 are along the side wall
- o To the rear wall, Location Id. 31 thru 39
- o Front wall, Location Id. 40 thru 48
- o Floor, Location Id. 49 thru 63
- o Location Id. 64 thru 71 (Triangles represent hot spot smears)
- o Ceiling, Location Id. 72-86

Alpha and beta surface scans detected higher than normal readings relative to background inside Building 517. Alpha surface scans ranged from 4 cpm to 200 cpm. A large number of the alpha surface scans ranged between 4-12 cpm which is comparable to background. Background alpha surface scans for outdoors and indoors were 1 cpm and 2 cpm, respectively. Some areas inside Building 517 had significant alpha activity as shown in Attachment 3.

The beta surface scans ranged from 20 cpm to 1100 cpm inside Building 517. The majority of the beta surface scans taken inside the building were consistently higher than background readings. Background beta surface scans taken indoors and outdoors were 30 cpm and 50 cpm, respectively. A visible watermark, approximately two feet above the floor, could be observed on the walls during the characterization study. The watermark appears to be a line of demarcation between higher beta surface scan readings and lower beta surface scan readings. In general, the higher beta scan readings were observed on the wall below the watermark, as well as the floor. It is suspected that the high beta readings are from the radium daughter products as discussed earlier in the Objective Section of this report.

Gamma surface scans inside Building 517 did not show any significant detection levels above background. Background readings indoors and outdoors ranged from 1500 cpm to 2600 cpm. The readings taken inside and outside Building 517 were consistent with background. The lack of gamma activity inside Building 517 would be consistent with the Army's findings in 1961 where the Radium D, Radium E, and Radium F exhibit little or no gamma activity.

All direct radiation measurements ranged from 4 uR/Hr to 7 uR/Hr. Lower readings were observed outside of Building 517. Direct radiation background measurements taken inside and outside were 4 uR/Hr and 7 uR/Hr, respectively. The low direct radiation measurements outside and inside Building 517 are indicative that the Army was successful in reducing the source of radiation inside Building 517.

Samples were collected from two pipes located in the front of the building. The samples were scraped from the pipe and collected in a plastic bag for gross alpha and gross beta measurements. The alpha and beta activity from the front pipe and side pipe were 310 dpm alpha and 1692 dpm beta, and 130 dpm alpha and 530 dpm beta, respectively. It appears that the pipes still show some activity levels from the decontamination efforts conducted by the U.S. Army in the 1950s and 1960s.

Soil samples collected outside and around Building 517 showed slightly elevated activity above background for Ra-226 in two areas. The concentration for Ra-226 ranged from 1.5 pCi/g to 3.5 pCi/g. Background concentrations for Ra-226 in soils, in Guernsey County, OH ranged from 0.6 pCi/g to 1.0 pCi/g. The background concentration for Ra-226 at the Mound Plant in Miamisburg, OH is 2.0 pCi/g. The Army Corp. of Engineers collected background soil samples around Marion County in 1997 prior to the excavation in front of the River Valley High School. A total of 10 background soil samples were collected and analyzed for Ra-226 and other radionuclides. Only one sample was reported to have a value greater than the minimum level of detection. The value was 8 7 pCi/g. The minimum detection was 4.0 pCi/g. It is difficult to determine at this time if the slightly higher levels of Ra-226 were the result of leakage from the equipment containing Ra-

226 in Building 517 or just abnormally higher background readings. The slightly elevated Ra-226 concentrations are considered borderline background at this time.

#### CONCLUSION

It can be concluded from this radiological characterization study that Building 517 has fixed alpha and beta contamination in excess of background. This activity appears to be embedded mostly in the floor and the first 2 feet below the watermark on each wall. Although the study does show that fixed alpha and beta surface activities are higher than background levels, it is suspected that the high readings are attributed to the daughter products of Ra-226.

The three suspect radionuclides that may account for the high alpha and beta activity inside Building 517 are Pb-210 (Radium D), Bi-210 (Radium E), and Po-210 (Radium F). The radionuclide Pb-210 is a long-lived daughter product of Radon 222 with a half-life of 19.4 years. This would explain the presence of this material in the concrete and possibly the soils today. The radionuclide Pb-210 produces a very low energy beta and gamma emissions. The gamma energy is 46.5 KeV and is produced only 4% of the decay process. The radionuclide Pb-210 decays to Bi-210. The Bi-210 decays to Po-210 producing an energetic beta ray and the radionuclide Po-210 which decays to Pb-206 (stable) by alpha emission. The Bi-210 and the Po-210 probably account for the large fraction of the detections.

It is hypothesized that the contamination detected from this survey did not occur during the storage of the Ra-226 equipment. But rather, the contamination was the result of the Radon gases emanating from the Ra-226. Thus the high level of Ra-226 used in the equipment produced excessive amounts of Radon into the building. The radon decayed to other radionuclides that have becomed fixed in the lower 2 foot section of the wall and the floor. Since the Pb-210, Bi-210 and Po-210 produce little or no gamma activity, this would account for the lack of gamma detections during the survey.

Two soil samples showed slightly higher than normal Ra-226 concentrations. The levels are extremely close to background levels and it is difficult to determine at this time if the Ra-226 concentrations are the result of past operations at Building 517 or just simply abnormal high background concentration.

#### RECOMMENDATION

It is recommended that Army Corp of Engineers identify, by radionuclide, the fixed alpha and beta activity detected inside Building 517. In addition, the Army Corp of Engineers should examine the soils directly beneath Building 517 to determine if any contaminants have penetrated the concrete floor via cracks or crevices during storage and/or during decontamination. The scope of this examination should also cover the surrounding soils around Building 517. Finally, the Army Corp of Engineers should also develop recommendations should further decontamination be necessary.

#### ATTACHMENT I (Cont.)

# OHIO DEPARTMENT OF HEALTH BUREAU OF RADIATION PROTECTION FIELD INSTRUMENTATION FUNCTIONALITY CHECK OCTOBER 31, 1997

				٠.		Bac	kground
	Instrument	Serial No.	Cal. Due Date	Battery	Source	<u>Park</u>	Apartment
]	I. Ludlum Model 19	123914	07/17/98	Sat.	140 uR/Hr	NA	NA
2	2. Ludlum Model 18 w/Model 43-90	120973 125788	08/27/98	Sat.	NA	NA	NA
, 3	3. Ludium Model 3 w/Model 44-9	16253 125090	04/03/98	Sat.	6000 cpm	NA	NA .
4	Ludlum Model 12-4 w/Model 44-2	26215	06/25/98	Sat	80000 cpm	ŅA	NA

NOTE: 1) Source Description A001 Co-60 0.80 uCi 06/29/93

- 2) All cables were observed as satisfactory
- 3) NA means Not Available

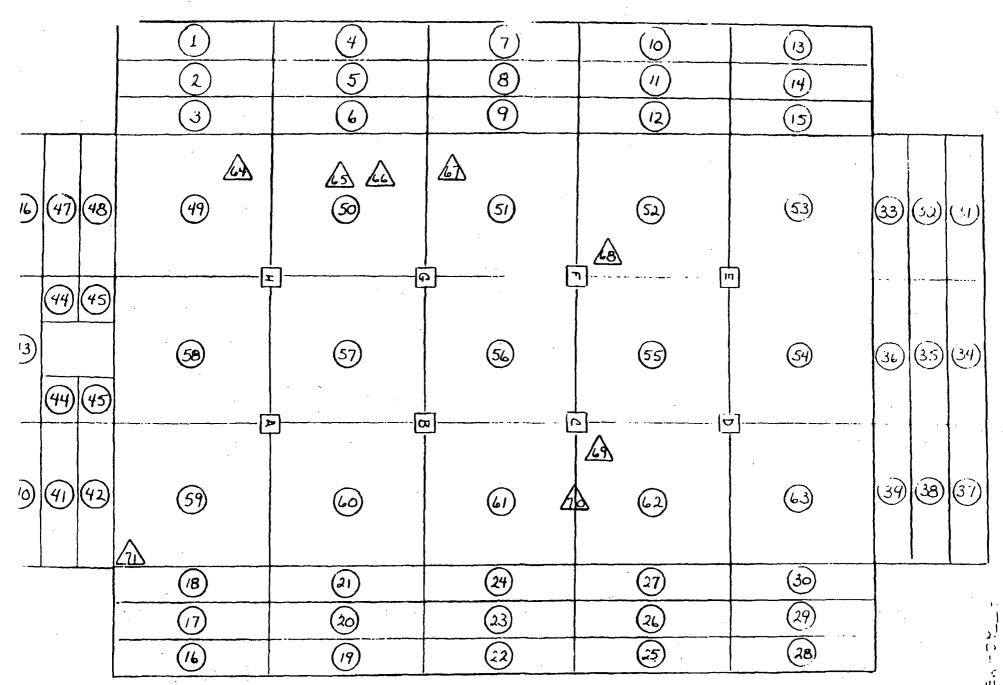
#### ATTACHMENT 1

# OHIO DEPARTMENT OF HEALTH BUREAU OF RADIATION PROTECTION FIELD INSTRUMENTATION FUNCTIONALITY CHECK OCTOBER 30, 1997

<u>'_</u>	•			•	Back	ground
Instrument	Serial No.	Cal. Due Date	Battery	Source	<b>Park</b>	Apartment
1. Ludlum Model 19 Micro-R Meter	123914	07/17/98	Sat.	140 uR/Hr	7 uR/Hr	4 uR/Hr
2. Ludlum Model 18 w/Model 43-90	1209 <b>7</b> 3 125 <b>788</b>	08/27/98	Sat.	NA	1 cpm	2 cpm
3. Ludlum Model 3 w/Model 44-9	16253 1250 <del>9</del> 0	04/03/98	Sat.	6000 cpm	50 cpm	30 cpm
4.Ludlum Model 12-4 w/Model 44-2	26215	06/25/98	Sat.	70000 cpm 2	2400 cpn	n 1500 cpm

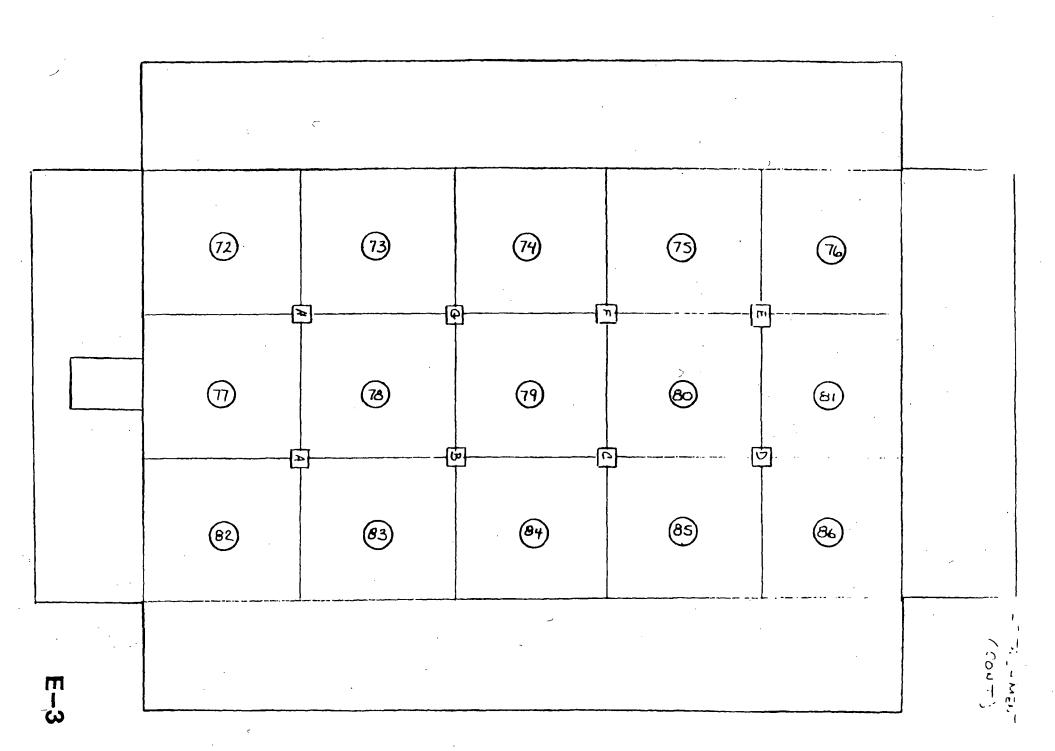
NOTE: 1) Source Description A001 Co-60 0.80 uCi 6/29/93

- 2) All cables were observed as satisfactory
- 3) NA means Not Available



E-3

1



#### ATTACHMENT 3 SUMMARY OF DATA BLDG 517 SURFACE AREA

Location Id.	Alp	ha	В	eta	Gan	nma	Smear A	Activity	Direct Radiation
	Avg.	High	Avg.	High	Avg.	High	Alpha	Beta	
	(cpm)	(cpm)	(cpm)	(cpm)	(cpm)	(cpm)	(dpm)	(dpm)	(uR/Hr)_
•			9.0		2400		0.00	2.02	
1	4	-	80		2400	-	0.80	2.82	-
2	6	•	80	-	2400	•	0.62	3.21	•
3	6	•	80	280	2400	-	0.49	1.83	-
4	4	-	80	-	2600	•	0.80	2.82	•
5	4	-	80	•	2300	-	0.49	2.43	-
6	12	60	100	160	2400	•	0.62	3.97	•
7	4	•	120	-	2400	•	0.71	2.43	-
8	6	-	120	280	2300	-	0.80	2.59	•
9	12	96	100	320	2400	-	0.31	2.89	•
10	4	-	100	-	2500	-	0.62	2.89	-
11	4	•	100	-	2400	•	1.02	2.52	• .
12	6	60	120	•	2500	-	1.33	3.05	•
13	6	-	120	500	2400	-	0.49	2.59	•
14	4	-	180	•	2200	•	0.71	2.13	•
15	8	•	160	180	2400	-	0.31	3.35	-
16	4	•	100	-	2300	-	0.40	3.35	•
17	6	-	160	•	2200	•	0.62	2.66	•
18	6	60	140	400	2200	•	0.80	2.29	. ~
19	4	-	100	•	2400	-	0.19	2.13	•
20	4	-	160	•	2200	-	0.31	2.20	-
21	6	•	140	200	2100	-	0.49	2.89	•
22	4	•	120	-	2400	-	0.49	2.82	
23	4	•	160	•	2300	-	0.49	2.89	<del>-</del> .
24	6	•	180	300	2400	•	1.33	3.12	-
25	4	-	120	-	2500	-	0.93	2.82	-
26	6	•	160	- '	2500	-	0.49	2.43	•
27	6	-	140	300	2400	-	1.54	3.51	•
28	4	-	120	-	2200	•	0.93	2.13	• .
29	4	•	140	280	2400	-	0.40	2.59	•
30	6	-	160	-	2400	• '	1.54	4.13	•
31 .	4	-	140	-	2400	-	0.71	2.66	-
32	4	•	120		2200	• .	0.62	3.05	•
33	6	•	130	600	2300		0.71	3.67	•
34	4	-	80	-	240Ô	•	0.62	3.05	•
35	4	•	20	-	2400	-	0.40	2.36	•
36	6	60	80	180	2200	-	0.40	2.82	-
37	4	•	40	•	2300	•	0.49	2.06	-
38	4	-	40	-	2400	•	0.71	1.74	
39	4	-		280	2400	_	0.49	2.52	•
40	4	-	•	300	2400		0.93	3.05	
41	4	-	80	-	2200	_	0.40	2.66	•
42		132	80	600	2200	-	0.62	2.98	_
43	4	-		460	2400	-	0.62	2.36	- -
44		<del>-</del>	80		2300	•			•
<del>7-7</del>	4	-	φU	380	4.JUU	•	0.40	2.59	•

#### SUMMARY OF DATA (CONT.) BLDG 517 SURFACE AREA

Location Id.	Air	oha	E	Beta		nma	Smear	Activity	Direct Radiation
	Avg.	High	Avg.	High	Avg.	High	Alpha	Beta	
	(cpm)	(cpm)	(cpm)	(cpm)	(cpm)	(cpm)	(dpm)	(dpm)	(uR/Hr)
			100		3.400			2.01	
46 47	4	-	100	-	2400	•	1.02	3.21	•
47	4	-	80	-	2200	-	0.62	3.21	•
48	-	•	80	280	2200	-	0.49	2.89	•
49	25	-	400	800	2500	-	1.94	5.50	6
50	80	200	200	800	2600	-	1.02	3.28	•
51	25	-	300	500	2400	-	1.85	4.49	7
52	19	70	180	-	2400	-	1.11	4.72	•
53	20	•	200	•	2500	-	1.64	4.43	6
54	26	.*	200	-	2600	-	2.25	5.41	. 7
55	21	-	200	-	2400	• .	2.96	7.18	•
56	29	-	400	-	2500	-	3.27.	8.39	6
57	22	-	200	•	2400	•	2.16	5.27	•
58	27	•	200	-	2400	-	0.49	3.67	•
59	20	-	-	500	2500	• .	1.33	3.90	6
60	21	-	400	•	2400	-	1.64	4.65	•
61	25	-	400	600	2500	•	4.32	9.63	7
62	29	•	400	1100	2400	-	1.85	6.26	• 1
63	27	•	200	-	2400	-	2.04	4.72	6
64	•	•	-	• .	-	•	2.50	5.73	-
65	-	•	•	•	•	•	10.06	15.13	-
66	-	-	-	-	-	•	5.65	10.91	•
67	<u>.</u> ~	•	-	-	-	-	1.42	5.41	-
68	-	-	. •	•	•	•	4.01	10.62	•
69	• .	-	•	•	-	-		13.53	•
70	-	•	-		-	-	1.42	3.44	•
71	•	-	-	•	-	-	1.85	6.49	• .
72		-	300	-	2400	•	•	•	•
73	-	-		400	2200	• ′		_	•
74			300	•	2300	-		_	-
75				400	2200	. •			-
76		-	300	•	2100		_	_	
77	•			400	2300	_	_	_	-
78	-	_	300	-	2200	_		_	-
79	_	_	300		2400	<del>-</del>		-	-
80	· -	<u>-</u>	300	_	2300	•	•	•	-
	•	-		•		-	-	-	•
81	•		300	-	2300	•	•	-	-
82	•	-	300	-	2400	-	-	-	•
83	-	-	300	-	2200	•	-	-	•
84	•	-	300	-	2200	•	•	-	•
85	•	-	300	-	2500	-	-	•	•
86	-	-	300	-	2200	-	•	-	•

#### ATTACHMENT 3 SUMMARY OF DATA MISCELLANEOUS SAMPLES

## A. Support Columns

	(	Count Rate (cpm)	
Columns	Upper Section	Middle Section	Lower Section
A	200	200	300
В	200	200	300
С .	200	200	300
D	200	200	400
. E	200	200	300
F	200	200	300
G	200	200	I (0
Н	200	200	300

#### B. Control Smears

	(dpm)				
Smear Id.	Alpha	Beta			
1	0.19	2.20			
2	0.40	2.66			
3	0.40	1.74			
4	0.49	2.20			
5	0.31	2.06			
6	0.31	2.20			

#### C. Pipe Samples

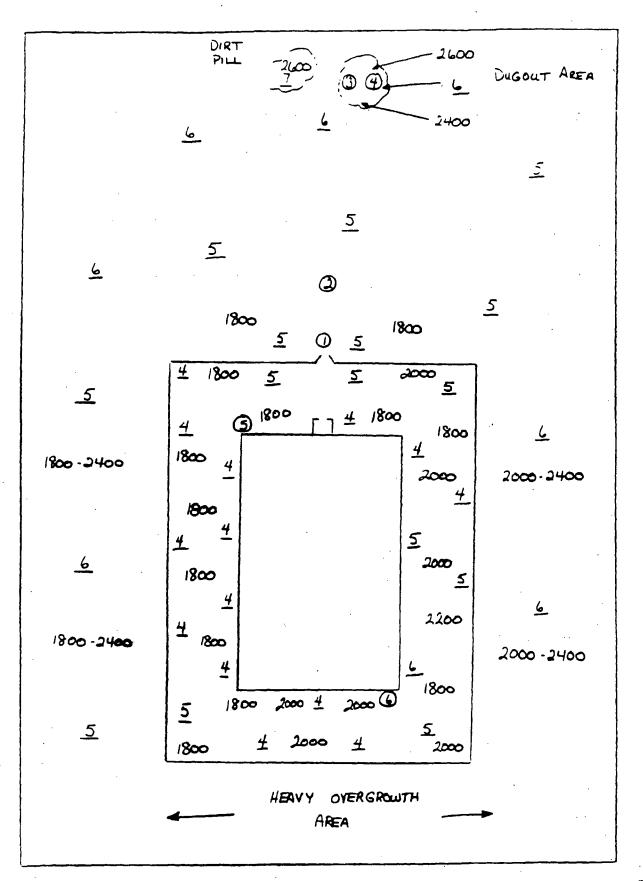
	(dpm)				
Sample Id.	Alpha	Beta			
Pipe-Front	309.80	1692.25			
Pipe-Side	129.65	530.25			

#### D. Soil Samples

		(pC	i/Kg)	
Soil Id.	K-40	Cs-137	Ra-226	Th-234
1	3659	309	1491	1238
(0-1Ft)				
1	3385	252	1610	1790
(1-2 Ft.)				
2	4961	520	2360	1761
3	11070	448	3387	2384
5	3772	746	1990	1693
6	2480	1198	2069	1059
7	11840	91	3463	3625
1				

ATTACHMENT 4

Measurements Outside Building 517



. • . 6 

#### MARION ENGINEER DEPOT

#### TAB A (See par 3)

#### MISSION (SECTION VII, SR 780-12-1)

#### SUPPLY

- 1. Key.- To receive and store selected general engineer supplies for issue as required.
  - 2. Reserve. To store bulk general engineer items for issue as required.

#### OTHER ACTIVITIES

- 3. Assembly.- To assemble component items into sets for issue as assigned.
- 4. Maintenance.-a. To perform base maintenance of all items of engineer equipment in accordance with current directives pertaining thereto, for all installations located in the Military District of Washington, and the States of Delaware, Mentucky, Maryland, Ohio, Pennsylvania, Virginia, and West Virginia, and from outside this base maintenance area as directed.
- b. To perform base maintenance of searchlights and searchlight components in accordance with current directives pertaining thereto.
- c. To support organizational and field maintenance by accepting and accomplishing work beyond the capacity of field maintenance and by providing technical advice, assistance, and inspection service to all military users of engineer equipment in the base maintenance area.
- 5. Stockpile.- To receive and store strategic and critical materials in quantities as directed by the Chief of Engineers, for the account of the Bureau of Federal Supply, Treasury Department.

Z

.

.

10 E-8044 File 2-6-51 myn

TECRD MER

400.1 (8-23-01-001)

2d Ind

SUBJECT: Inspection of Metascopes

Engineer Research and Development Laboratories, The Engineer Center and Fort Belvoir, Fort Belvoir, Virginia 13 DEC 1950

THRU: Commanding General, The Engineer Center and Fort Belvoir, Fort Belvoir, Virginia

TO: Chief of Engineers, Department of the Army, Washington 25, D. C. ATTENTION: Chief, Engineer Research and Development Division

- 1. Mr. Myron W. Klein of the Engineer Research and Development Laboratories visited the Marion Engineer Depot on 19 October 1950 and made an inspection of the Metascopes, Type US/F which were stored there. Colonel Clinton C. Maupin of the Army Industrial Hygiene Laboratory accompanied Mr. Klein on this inspection and made measurements of the radioactive emission from the metascopes. The results of his measurements, together with his recommendations for future storage and handling, have been reported separately by him.
- 2. The metascopes are stored in two frame buildings, which are clearly marked as containing radioactive materials, and which are surrounded by a locked barbed wire enclosure. All persons entering the buildings are required to wear film badges, and only authorized personnel are allowed to enter.
- 3. The metascopes are almost all in waterproof packages, and the majority of these are in their original factory crates. All broken or obviously unserviceable instruments had been salvaged by Depot personnel. Approximately 1000 unfinished instruments were found among parts returned from Electronics Laboratories at the close of the contract.
- 4. Sixty metascopes were selected as representative samples. Of these one Sampson instrument and one Electronics instrument were taken by Colonel Maupin for radicactive measurements. The remaining 58 were shipped to the Engineer Research and Development Laboratories for evaluation. On inspection, after arrival at the Engineer Research and Development Laboratories, the 58 metascopes were found to be in generally good mechanical condition. Twelve Sampson and two Electronic instruments were found to be on "charge", which in most of these instruments had resulted in complete destruction of their infrared sensitivity.
- 5. The remaining hh metascopes were tested for infrared threshold sensitivity and only two were found to have sensitivities as good as

5- Barret.2

TECRD MER 400.1 (8-23-01-001) -SUBJECT: Inspection of Metascopes

the minimum value of 10 nautical mile candles as required by the original specification. The remainder had lower sensitivities as follows:

11-15 nmc, 12 instruments 16-20 nmc, 16 instruments above 20 nmc, 14 instruments

6. Many of the 58 metascopes were found to have bad scintillations which indicated that the decay product of radium, radon, had leaked through the plated coating on the charging foil and had contaminated the phosphor.

- 7. It is considered that the sensitivities of almost all of the instruments have so deteriorated that it will be necessary to recondition them before they can be issued for service use. This can be done by replacing the phosphor focal surface in each unit.
- 8. One of each type of metascope was disassembled at these Laboratories and the steps required in this operation determined. Mr. Levine, Maintenance Division, Office of the Chief of Engineers, witnessed the disassembly of the metascopes and made complete notes on the operations required.
- 9. The 58 metascopes are being returned to the Marion Engineer Depot.

FOR THE COMMANDING OFFICER:

DON L. BURDETTE Executive Officer

TECAG 4 00. 1

3nd Ind

Hq, The Engr Cen & Ft Belvoir, Ft Belvoir, Va. 15 DEC 1950

TO: C of Engrs, DA, Washington 25, D. C.

mm m

 Hazardous, Toxic and Radiological Waste
Archives Search Report
for
Marion Engineer Depot
Marion County, Ohio
Project Number G050H015003

APPENDIX D

TEXTS/MANUALS

#### APPENDIX D

#### TEXTS/MANUALS

#### Table of Contents

D-1 The Scioto Ordnance Plant and The Marion Engineer Depot of Marion, Ohio, A Profile After Forty Years, Charles D. and Delpha Ruth Mosher, The Marion County Historical Society, Marion, Ohio, 1987 (B-20)

# THE SCIOTO ORDNANCE PLANT and THE MARION ENGINEER DEPOT of Marion, Ohio

## A Profile AFTER FORTY YEARS

By Charles D. Mosher and Delpha Ruth Mosher

#### **DEDICATION**

This Profile of the Scioto Ordnance Plant and the Marion Engineer Depot is dedicated to the men and women who worked there and who put their lives at risk for the war effort. Many of them were injured and four were killed. They all helped win the war.

Cover Design

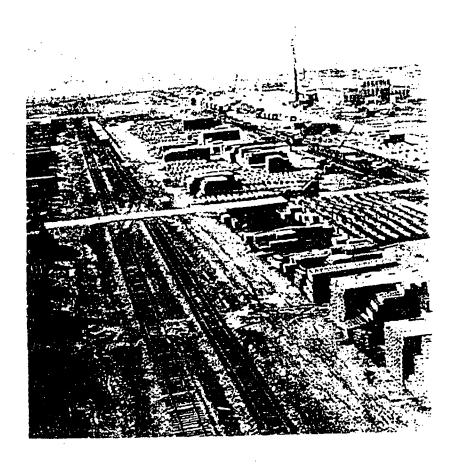
The 100,000th bomb produced at The Scioto Ordnance Plant Maxine Hawk Alban, Twila Delaney Holliday, Ruth Stumbo Haubert, Katharine Poorman Stevens

Copyright 1987 Charles D. and D. Ruth Mosher Published by Charles D. and D. Ruth Mosher in cooperation with The Marion County (Ohio) Historical Society

Trella H. Romine, Editor

First Printing 1987 Library of Congress #87-067402 Printed by Glanz Printing Company, Wauseon, Ohio Steve White, Publications Consultant Box 622, Napoleon, OH 43545

### PART II



A PROFILE OF
THE
MARION ENGINEER DEPOT

#### TIMELINE

#### Part II

## The Marion Engineer Depot

April 22, 1941	Construction of Engineer Storage Depot authorized.
Early May 1942	War Department contacted farmers for land acquisition.
Early June 1942	Deadline for farmers to vacate area.
June 11, 1942	Construction of facilities began.
August 23, 1942	Second Battalion of 333rd Engineers Regiment arrived.
September 1942	Marion Engineer Depot began operation.
September 24, 1942	Colonel Carleton B. Shaffer, first CO, assumed duties.
November 30, 1942	Second Battalion of 333rd Engineers Regiment departed.
December 7, 1942	Marion Engineer Depot dedicated.
May 1943	Peak tonnage shipped.
June 26, 1943	445th Engineer Base Depot Company arrived.
August 14, 1943	445th Engineer Base Depot Company departed.
November 24, 1944	Colonel David L. Neuman died at MED.
June 18, 1945	ASFTC-30th Training Regiment arrived.
September 4, 1945	World War II ends.
1948	Employment near 1,300.
1959	Employment near 1,000.
July 5, 1960	Phasedown of MED announced to employees.
1960	Employment near 500.
June 30, 1961	Closing of MED operations.
June 25, 1970	Reunion of MED employees held.
May 27, 1986	Asbestos storage at MED revealed.

#### CHAPTER 12

#### Second War Facility Comes To Marion County

#### Summary Of The Operation Of The Marion Engineer Depot

With the community reeling from the impact of the construction of the Scioto Ordnance Plant it was unaware that on April 22, 1942, the Corps of Engineers of the Ohio River Division had received authorization for the construction of an Engineer Storage Depot in the vicinity of Marion, Ohio.

The Division Engineer had been instructed to proceed immediately with the acquisition of land and preparation of plans for construction. Two authorizations totaling \$4,000,000 were made for the planning and construction. The site of Marion was selected because of its railroad facilities, the accessibility of construction equipment and the availability of workers skilled in maintenance and operation of construction equipment.

The site chosen contained 640 acres and was located along Route 30 South (now Route 309) approximately two miles east of the city limits of Marion. Farmland was acquired, the farmers moved and construction began June 11, 1942 and was completed on November 30, 1942.

Marionites had to learn a new pronunciation for the word "depot". While the facility in west Marion where you met trains was called the "dEE-po", this new area east of Marion was called a "dep-o" which means a warehousing facility for military supplies

During the next several months the new depot had various names. It was called the War Aid Depot, The Marion Quartermaster Depot, The Marion Holding and Reconsignment Depot, and finally the Marion Engineer Depot.

It was laid out with 4 avenues, 6 streets, and had 22 miles of railroad track. It was the largest depot of its kind in the United States, storing and renovating heavy construction machinery for the U.S. Army. During its peak production month of May 1943 it handled 44,000 tons of troop stock shipped and 23,000 tons received.

To help with the construction of railroad lines, the Second Battalion of the 333rd Engineers Regiment of the U.S. Army arrived on Sunday, August 23, 1942. This was the first of several military units to be stationed at the depot.

Prisoners of War were encamped at this depot and were used for labor and mechanical work from December 1944 to February 1946, with a total of 344 being utilized in April 1945. Their barracks at the east end of the depot grounds had originally housed the army engineer troops and was called Camp Marion.

Peak employment at the depot during the war totaled 1,487 civilians in July 1944, plus military personnel.

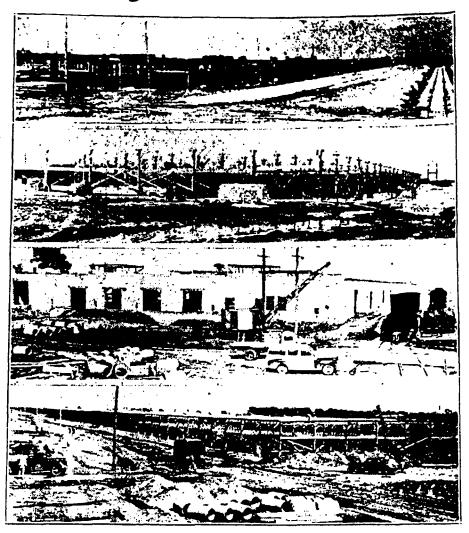
Following the war the Marion Engineer Depot contributed to the economy of the community until 1960 when a phaseout began. Employees were transferred or separated and the facilities were phased out. A 141 acre section of the old depot grounds was used by the U.S. General Services Administration.

Land at the east end of the depot where prisoners of war had been housed was acquired by the newly organized River Valley School District for the construction of a consolidated high school. Other land and buildings on the depot grounds were sold. An era had ended.

A profile of the Marion Engineer Depot follows.



## Work Progresses on War Aid Depot



The first published camera views of Marion's Quartermaster War Aid Depot where hundreds of workers are pushing construction of a big-scale warehouse for wartime use.

Top: One of the huge open sheds — roofed but with no sides —which are big enough to accommodate several football games simultaneously.

Second from top: Framework of another big storage building.

Third from top: Concrete block structure that is so long it fades out of sight in the photograph.

Bottom: Another view of the big buildings. The caterpillar excavator and automobile in the foreground serve by comparison to indicate the size of the huge building. In the foreground also is some of the mud which workers have sloshed through after every rain. The work goes on in spite of weather that would stop most construction projects. (THE MARION STAR Photos)

#### CHAPTER 13

#### Construction Phase

By now, farmers in the area were fully aware that, while they could contest the price offered in federal court, they could not effectively resist the government's power of eminent domain.

THE MARION STAR chronicled the activities of the new war facility east of Marion as it had the activity at the Scioto Ordnance Plant north of Marion. Bob Byrd's front page article of May 6, 1942 recounts the second land take-over faced by area farmers:

Owners of some 700 acres of farm land not far from the south boundary of the ordnance plant have reported that war department representatives already have contacted them about acquiring their land, and that they indicated unusual speed will be necessary in clearing the land for the project.

This seems to indicate that the depot project may proceed with even greater speed than the Scioto Ordnance Plant, and that a large number of workmen might be employed to handle the job as quickly as possible. (THE MARION STAR. May 6, 1942, p. 1)

The same issue of THE STAR carried an article with the bold headline "Marion Area Expected To Get Army Warehouse." It follows:

Another large war department project in the Marion area seemed assured today when The Associated Press reported the war department had announced authorization for construction of two depot warehouses in Ohio.

The warehouses will cost "in excess of \$3,000,000" each and the Columbus and Pittsburg engineers' offices will supervise construction, the war department announced.

The project to be supervised by the Columbus war department engineers' office is expected to be located near the south boundary of the Scioto Ordnance Plant. However, it is not expected to have any connection with the ordnance plant.

It was unofficially estimated that several thousand workmen will be employed, since the function of the depot is understood to be a storage and distribution center, requiring acres of floor space under roof. Since speed is essential, it was generally believed the building would be largely of frame construction.

Such a project also would involve construction of a number of miles of railroad tracks and roadways.

It was not indicated whether the depot would be operated by the army's Service of Supply or the Quartermaster Corps.

In any event, the operation of a supply depot is regarded similar to that of a wholesale mercantile concern, carrying a reserve of thousands of items in stock for distribution to various points as needed.

Since storage depots for munitions usually occupy larger areas than the tentative acreage mentioned in connection with the one announced today, it is believed the depot will handle little if any supplies of an explosive nature.

Preparations for the project presented a number of new problems for Marion and nearby communities. With peak employment on construction of the Scioto Ordnance Plant estimated to reach between \$,000 and 10,000 men some time this summer, the prospects of providing housing for additional thousands of workers greatly enlarges the housing problem. The problems of recreation and other needs of workers also would be affected. (THE MARION STAR, May 6, 1942, p. 1)

#### What Do We Call It?

During its early stages the project east of Marion seemed to be groping for a name as evidenced by the article in THE STAR on May 21, 1942 when it was called "The Marion Holding and Reconsignment Depot." While this article estimates 500 employees would be needed to operate the Depot, peak employment reached nearly 1,500.

Work is progressing quietly but rapidly on the preliminary stages of Marion's new military project, the Marion Holding and Reconsignment Depot, to be built near the south border of the Scioto Ordnance Plant.

Major G. Davies, 40, of the U.S. Army Corps of Engineers, has arrived in Marion and is serving as acting area engineer.

The Toledo Architect-engineer firm of Britsch & Munger is now preparing preliminary engineers' studies and construction drawings, and it is expected a contract for the construction work will be awarded around June 1.

The construction project is expected to provide employment for between 1,500 and 2,000 workers during peak operations, and to run for possibly five months.

When completed, the depot probably will provide employment for 500 operating employees. It will serve as a depot for storing and distributing war materials and will occupy an area of between 700 and 1,000 acres.



Major Davies, the acting area engineer, has been connected with government projects over a period of years, most of the time as a civilian employee engaged in engineering work. (THE MARION STAR, May 21, 1942, p. 1)

In the June 3 MARION STAR article another name was used for the facility east of Marion — "Marion War Aid Depot". Its function was to serve the United States and her allies under direction of the Army's Service of Supply.

The war department announced new details about the Marion War Aid Depot to be built near the south border of the Scioto Ordnance Plant today, in an Associated Press dispatch from Washington.

One development was that the Marion depot will be one of four to be built in Ohio and one of 11 new depots in the nation to be built this summer for use as army storage plants.

It also was announced that the depots will be used for storing food, munitions and equipment not only for this country but its allies as well.

Each will consist of dozens of one-story warehouses and many acres of ground for open storage, offices and railroad facilities.

It will be operated by the General Depots Service of the Army's Service of Supply.

Capt. Robert Lockridge, area engineer here representing the war department engineers during the construction of the depot, said contracts were let for the construction work this week, and that work will be started yet this week.

Six concerns shared in construction contracts, the F. & Y. Building Service of Columbus, Hanagan Brothers of Urbana, Mike D. Fatol of Cleveland, Cyclone Fence Co. of Cleveland, Paul L. Gilmore of Columbus and the Queen City Railroad Construction Co. of Cincinnati.

The project is expected to cost in excess of \$8,000,000, will employ about 2,000 men during its five month construction period and will require some 800 persons for operation. It was indicated that most of the

or erating personnel will be civilians, probably most of them from the Marion area, working under direction of army personnel. (THE MARION STAR, June 3, 1942, p. 1)

Losing no time, the F. & Y. Building Service of Columbus commenced constructing "some offices" and the STAR reported the following on June 10, 1942:

Steady progress in preparations to start large-scale construction work on the Marion War Aid Depot near the south border of the Scioto Ordnance Plant was reported today by Capt. Robert Lockridge, area engineer.

Occupants of farms on the depot site received formal notices about June 1 informing them the site should be cleared by June 20. Meanwhile, negotiations for purchase of the properties by the government are progressing.

Contractors expanded their program of work considerably today. The F. & Y. Building Service of Columbus has already erected some offices and construction shanties in preparation for expansion of their activities. The architect-engineer firm of Britsch & Munger of Toledo has established offices in a

building formerly used as a roadside stand.

It is expected that by June 15 construction forces will be in full operation, Capt. Lockridge said.

When work gets in full swing, the area engineer said he plans to ask motorists to observe voluntarily a slow speed area along highways bordering the site in view of the fact there will be considerable movement of machinery across the highways at times.

Some of the work already under way is railroad spurs to connect the site with nearby railroad lines. (THE MARION STAR, June 10, 1942, p. 1)

#### Cement Mixer

Mr. Jim Jackson, a tall black man, was born June 2, 1886, which made him 99 years of age when interviewed, or "two nines," as he put it.

Born near Chicago, Illinois, Jim moved to Marion, Ohio in 1919. "I saw President Warren Gamaliel Harding many times," Jim said proudly. "And spoke to him several times too. He was just a common, ordinary citizen. He wasn't clear upstairs when he belonged down on the ground. He was just one good guy."

Jim worked on the WPA during the early Roosevelt years and made \$26.40 every two weeks. "And we were glad to have work. It didn't buy fancy food or clothes but it got us by."

Commenting on his work in mixing cement, Jim said, "I learned that fifty-six years ago, then used my experience in building bridges under WPA, then worked at the Scioto Ordnance grounds and Marion Engineer Depot when they put up the buildings.

"There was a Jew who had the construction of the Depot — I just forget his name — but he put the buildings up out there. That was the spring of 1942. as I recall, and I worked on buildings from the west end to the east end out there.

"They had block handlers come in from North Carolina, and then they had fellows who laid the blocks. Oh, it was a big operation.

"Later I worked in the Boxing Plant at the Depot. The company was out of Wisconsin and they were under the direction of the military. I drove a little Jeep in the Boxing Plant.





### Views Of County's First Army Camp

Camera views at the camp of the Second Battalion of the 333rd Engineers regiment east of Marion are shown above.

Top: One of the company streets, rows of tents holding from six to eight men each.

Second from the top: Under the man working on a pole is a company orderly tent and at the left one of its supply tents. The company's "top" sergeant lives in the orderly tent, making it the company's administrative headquarters. The "top kick" or first sergeant is the company's highest non-commissioned officer and serves as contact man between his men and the commissioned officers.

Third from the top: An interior view of one of the tents with two corporals sitting on a bunk studying one of the many army field manuals. At the right are some coats hanging from an improvised rack built around the tent pole. Soldiers carry all their belongings in a pack and in two bags like those shown on the bunks.

Fourth from the top: A typical company field kitchen. Old timers will recognize these army stoves, including the bake oven at the lower left, fired with wood.

Bottom: Soldiers gather around for the daily mail call with a husky-lunged corporal calling out the names of men to whom letters are addressed. (THE MARION STAR, September 9, 1942, p. 1)

### Engineer Units Set Up Camp

Several army units served at the Marion Engineer Depot.

The first to arrive was the Second Battalion of 333rd Engineer Regiment. Between 400 and 500 soldiers came in on the evening of August 23, 1942. They came to construct railroad lines for training purposes. They left the Depot on November 30, 1942.

The 445th Engineer Base Depot Company arrived at M.E.D. on June 26, 1943, at 6:30 P.M. They were brought here to be trained in every phase of depot operation. On August 14, 1943 the Company departed from Marion Engineer Depot.

On June 18, 1945, 100 enlisted men, unassigned and joined from 1614 SCU ASFTC-30th Training Regiment, arrived at this depot from duty at DS Columbus ASF Depot, Columbus, Ohio.

Then, on July 4, 1945 another 22 enlisted men arrived here from duty at DS Columbus ASF Depot, Columbus, Ohio. This Company of casuals were working primarily in labor and materials handling operations. By December 5, 1945 this Company was cleared.

### Second Battalion Makes Its Mark

With the arrival of the nearly 500 soldiers of the Second Battalion of the 333rd Engineers Regiment, THE STAR used still another name for the facility—"The Marion Quartermaster Depot." The article tells of the soldiers arrival:

Between 400 and 500 soldiers making up the Second Battalion of the 333rd Engineers Regiment arrived last night at the Marion Quartermaster Depot, near the south boundary of the Scioto Ordnance Plant.

Major Robert Lockridge, area engineer in charge of the construction of both ordnance plant and the depot, said the men are here to construct railroad lines for training purposes. He said the length of battalion's stay is not known.

The Battalion is in command of Lt. Col. Werk. The men detrained last night about 6:30 on the depot grounds. They spent the night in pup tents hurriedly set up in a field of wheat stubble near the east end of the grounds. Today they were erecting eight-man tents and other temporary facilities.

Nearly all the men enlisted, and are from various parts of the country and nearly all are especially qualified in various phases of engineer corps work.

Many of them in private life were authorities in various phases of construction work and the operation of large equipment.

This outfit was activated in May of this year. Its work will be entirely on the depot grounds, and the training work to be done by the battalion will be paid out by the area engineer, Major Lockridge. (THE MARION STAR, May 8, 1942, p. 1)

With the arrival of these soldiers, Bob Byrd, city editor of THE MARION STAR, gave his readers a "Byrd's eye view" of their camp which he shared with readers of the STAR on September 9:

# Soldiers Convert Farm Field Into Full-Fledged Training Camp

Marion county's first soldier camp in modern history is giving residents of this vicinity their first glimpse of army field life. The scores of automobiles that drive slowly past the camp at the east edge of the Marion Quartermaster War Aid Depot prove that Marion area residents are interested — and the soldiers add that they likewise have been unusually interested in seeing that the men enjoy themselves in their hours off duty.

Casual visitors aren't allowed at the camp, but persons calling on business are admitted regularly by armed guards who patrol the entire border of the camp 24 hours a day.

How a battalion of between 400 and 500 men can convert a field of wheat stubble into an orderly camp layout in short order is a source of never-ending wonder to civilians who never had a taste of army life. The Marion camp is well along — they're developing roads, the mess tents are nearly completed and the men are thoroughly settled down to business although they've been here only a few days.

Water, food, communications, sanitary facilities, laundry — these are just some of the things that have to be provided when soldiers open a new camp.

At the front of the camp, which faces east, are three tents. The middle one is battalion headquarters which now has the luxury of a telephone, a board floor and enough equipment to permit it to function nicely as an office. To the south of this is the tent of the commanding officer, Lt. Col. Herman Werk. To the north of the headquarters is the tent of Capt. Early P. Gray, the battalion adjutant.

Back of these three tents in a neat row are the tents of the other commissioned officers. Still back of these are the tents of the three companies that make up the

battalion. Other tents are placed in orderly fashion at various points around the camp. One group consists of the Medical Detachment including two doctors and a dentist as well as enlisted men trained in caring for the sick and wounded. Other units include a detachment of the headquarters and serve company; the supply headquarters and the motor pool.

This is an unusual battalion, and its present work, which is intended primarily to train the men to handle a wide range of construction projects, is considerably different from an average battalion's

training camp.

In the first place, the battalion was activated in May (1942) and is made up largely of men drawn from specialized lines of work, including among its officers architects and construction company men who held responsible positions in civilian life. Many of the men can handle a bulldozer or other pieces of heavy machinery like an average person can operate an automobile. There are railroad builders, men experienced in big-scale earth moving projects. Virtually all have some special skill or training that would make them valuable in almost any kind of construction assignment.

Learning their jobs and expanding their experience by actual practice, the men are building railroads, moving earth on a big scale and their present job also involves dismantling a part of the Marion county

CCC camp.

The men come from all parts of the nation. One large group is from the Pacific northwest. Other states with large representations include, Ohio, Pennsylvania, Idaho, Nevada and Utah, and there are smaller groups from almost every state in the union. Some of them were in construction trades. The range is from laborers on highway projects to a former railroad yard superintendent.

Among the commissioned officers the range is almost as great. Most of the officers are graduate engineers. The majority of officers came from the region of Boston and most of them are former engi-

neers or contractors in the Boston area.

The battalion started its existence in Louisiana, remaining there until the transfer to Marion county. After six weeks of intensive training in basic military subjects, the men turned to a study of their primary activity which is heavy construction work.

The men like Marion. From the time of their arrival they have remarked about the friendly attention they have received and voice appreciation of the things that have been done for them such as the Canteen dance and the opening of the Y.M.C.A. to them.

Although they have access to the shower rooms at the Y.M.C.A. and a few other conveniences, their life primarily is that of "roughing it." They live in tents, work all day in the open, line up at the field kitchen for their meals and line up again in front of three big kettles of hot water, one of them heavy with suds, to wash their mess kits after the meal is over. Their day's work and chores around camp would more than consume the energies of the average civilian but their training has given them enough pep to make use of the occasional leaves they get to come into Marion.

The commanding officer of the battalion is Lt. Col. Herman Werk of Covington, Va. His military service began when he attended the first officers training camp at De Presidio of San Francisco in 1917. While there he was assigned as a first lieutenant in the 10th Engineers (forestry) then being formed for immediate

service. He was made supply officer of the 20th Engineers, serving two years in the AEF.

Since the war he had charge of wood procurement for a large paper mill at his home town. He has been a reserve officer since the World war and received his present rank a year ago upon completion of the required training. For his work he received a citation from the commander-in-chief of the AEF entitling him to wear the decoration of the order of the Purple Heart, established by General Washington during the Revolutionary War.

Capt. Gray, the adjutant, for several years has been in charge of construction work for Kresge stores in the New England area. He and his wife came here from Boston. He was a lieutenant in the first World war and saw two years of overseas duty, building docks,

supply bases and railroads.

The other officers are of more recent military experience, but all of them have had engineering training and experience in varying degrees. (THE MARION STAR, September 9, 1942, pp. 1, 3)

### Lonely Soldiers Are Welcome Dinner Guests

The soldiers of the 333rd Engineers Battalion were made to feel at home by Marionites under the sponsorship of the Marion Amateur Day association:

A drive to provide Sunday dinners in Marion homes for all of the soldiers with the 333rd Engineers Battalion east of here who will be free for dinner invitations next Sunday was begun today by the

Marion Amateur Day association.

The association has asked Marion families willing to invite one or more of the soldiers for dinner next Sunday to telephone any one of three members of the association to make arrangements. The three are Marion Hinklin, president, who may be reached during office hours at telephone 2430, J. D. Torrance, who may be contacted at 6280 and J. R. Roby, who may be reached at 5256. Persons who are able to provide transportation for the soldiers will be asked to make arrangements to pick up the men at the camp and take them to their homes. The soldiers will provide their own transportation back to camp.

Mr. Hinklin explained the association realizes many Marion families have already invited soldiers to dinner, but that the drive is being staged to make every soldier who will be free for an invitation and wants one will have one waiting on him next Sunday. He said the association will make arrangements only for this coming Sunday, but added that some other organization might sponsor the dinner project on later Sundays.

Soldiers in position to accept Sunday invitations will be able to leave the camp at 11:30 a.m. Sunday, he said after conferring with Lieut. Grant, the camp service officer. (THE MARION STAR, September 9, 1942, p. 1)

### A Guest Becomes A Husband

Miss Virginia Andrews was one of the young ladies who was glad to see the 333rd Engineers Regiment come to the Marion area. She said with a chuckle, "There was a serious shortage of eligible young men during the war. We welcomed the first wave of soldiers that came in. Our family invited

### Wartime Operations

Long concrete block buildings stretched for two miles along 30S. Open sided storage buildings filled the area behind them. Auto traffic increased as workers reported for duty. Railroad cars on the spur leading into the new depot blocked that traffic. Oh yes, the Marion Engineer Depot had an impact on Marion in many ways!

### Engineer Depot Dedicated on Pearl Harbor Day

Just one year after the attack on Pearl Harbor, the U.S. Naval Base in Hawaii by the Japanese a large crowd assembled at the Marion Engineer Depot for formal dedication ceremonies of the large spreading complex. THE STAR reported:

The Marion Engineer Depot was dedicated formally to its task of helping supply Uncle Sam's fighting men in an impressive ceremony that included a flag raising and Pearl Harbor day observance yesterday afternoon.

It was announced in connection with the ceremony that in the last month the Army air force is making use of the Depot as well as the engineers, part of the Depot now being used as an Army air forces storage depot in charge of Major A. F. Spring.

Lieut. Col. Earl Baskey of Patterson Field was one of the speakers and said the Depot would play a part in the air forces supply work.

Soldiers from Camp Millard at Bucyrus conducted the flag raising ceremony.

Civil Air Patrol planes from Marion, Galion, Mansfield and Sandusky — a total of nine planes — swooped low over the Depot during the ceremony, their first appearance being timed to the second with the raising of the flag while the combined Harding High school and Pleasant Township school bands played the national anthem. Major Spring today voiced his appreciation for the cooperation of the patrol in its part of the ceremony and asserted the planes made a 'fine showing' in lieu of military planes which were not readily available.

A large square area surrounding the flag pole was the scene of the ceremony, at the south of the square was the speakers' platform on which sat a score of Army officers and civilians representing various Marion civic and patriotic organizations. Inside the area stood the visiting soldiers in two groups, and officers connected with the Depot stood in front of the speakers' stand. Workers from all over the Depot area marched to the ceremony and joined scores of Marion residents who responded to the invitation to the public to take part in the dedication.

After the ceremony, visitors were permitted to drive over approximately a mile of the concrete-paved streets inside the Depot and view at close range the huge concrete-block storage buildings and immense open-sided storage sheds and some of the miles of railroad tracks on the area.

Invited guests attended a reception after the ceremony in the officers' quarters building near the administration building. THE MARION STAR, December 8, 1942.)

There was a spirit of camaraderie among those who found jobs plentiful, a welcome relief after the bleak days of the Depression. In October of 1942, THE STAR carried an article with the headline:

### Workmen Needed at Engineer Depot

On October 30, 1942, an appeal was made through THE MARION STAR for carpenters and laborers to apply for work at the Marion Engineer Depot:

A critical need for 20 carpenters and 25 laborers to keep work going at the Marion Engineer Depot was reported today by Donald S. Ruff of the civil service commission in Cincinnati, assigned here to expedite work at the Depot.

Unless the men can be employed here, it will be necessary to hire men from outside the community because the work at the Depot must go on, Mr. Ruff said.

He said he felt there were enough men who have been laid off war construction work that is completed to fill the jobs without going outside Marion. Men who want the work should apply to Mr. Ruff at the United States Employment Service office at 163 East Center Street.

Another appeal for workers was in THE STAR of January 6, 1943, asking for workers willing to work outdoors, who were draft exempt and who would load and unload materials, thus increasing the volume of war supplies.

The following three articles are from THE MAR-ION STAR, November 29, 1943.

### Crane Repair Shop Busy

Crane repair shop on the site of the Marion Engineer Depot, the largest structure to be built since the original Depot construction program was completed a year ago last September, has been completed and since early this month cranes have been pouring in from all parts of the country for repair. From as far away as the upper extremities of the Alcan Highway, cranes and shovels have been shipped for repair by skilled workmen employed in the recently-compelted Depot crane shop.

First Lt. B. A. Haney, in charge of the shop, said that for a while cranes were shipped from all parts of the nation to the Marion Depot for big and little repair jobs. At present, however, only cranes from within a radius of about 1,000 miles are freighted here for repair.

The Marion Depot is equipped to do a through job of partially or completely rebuilding various types of cranes sent here. Not only is the sprawling repair shop equipped with the finest of precision tools and ideal equipment for the handling of the monstrous cranes, but it is also manned by men backed by years of experience in the manufacture of all types of cranes and shovels. Employed in the shop are men who before the outbreak of war were employed as craftsmen by crane and shovel manufacturers in Marion and elsewhere. These men, figuratively speaking, have been borrowed by Uncle Sam to do a duration job which is playing a mighty important role in America's war effort.

Some of the units brought here for repair are torn down and completely rebuilt. In some cases only minor repairs are made and then the big units are put back into action against the enemy. In some cases, Lt. Haney said, it is necessary to fabricate new parts for some of the shovels. In many cases it is difficult, or rather impossible, to obtain spare parts and new materials. In such cases tradesmen employed in the repair shop do the seemingly impossible task of making their own parts.

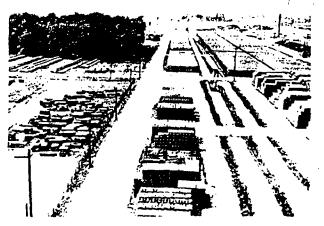
Cranes, which are being put in A-I condition, are sent to all parts of the country and overseas. At present 75 men are employed on a single shift in this phase of the Depot's activity. Lt. Haney said the force will be expanded and possibly a second shift formed.

### New Boxing and Crating Plant To Be Constructed

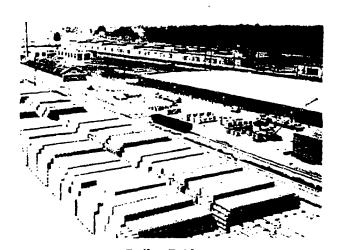
In connection with the completion of the repair shop, Col. David L. Neuman, new commanding officer at the Depot announced that plans are being made for construction of a boxing and crating plant on the Depot site. Col. Neuman said the building is considered as a means of expediting the flow of shipments handled by the Depot. Present plans call for the construction of a building 280 x 120 feet for this operation.

#### Still Another Plea For Workers

There is still a serious need for laborers and some skilled tradesmen at the Depot, Col. Neuman said. About 100 laborers are needed at the present.



Warehouses and Railroad Tracks



**Bailey Bridges** 



### The Manhattan Project at M.E.D.

Rumors had been bandied about that a part of the Manhattan Project, the name given a very secret operation to explore the manufacturer of the first atomic bomb, had been stored at the M.E.D. just prior to the exploding of the bomb in the desert.

The authors, after asking scores of people, finally found a woman who knew something about the subject. Mary Evelyn Prior revealed the following story:

"Well, I'm afraid I can't shed much light. All I know is that a lieutenant who worked in the Field Administration Office — . . . he was in charge of the warehouse in which I worked (He more or less supervised my supervisor) ... he knew that I was very familiar with the things that had been coming and going in the warehouse for a couple of months. Because any free time I had, like at lunch hour or breaks, I would wander around in there. So he came to me one day, and he said, 'Do you know anything about the Manhattan Project?' I'd never heard anything about it. And, of course, my records all had numbers somehow identifying shipments either incoming or outgoing. Nothing was identified by nomenclature — such as "Manhattan Project."

"So he said, 'Come with me and see if you remember seeing these boxes anywhere.' So I went to the west end of the Warehouse Three with him and there were several boxes. There was absolutely no identification on them. They were boxed up in their normal way, some were small, others were larger. There was no uniform size. There were ten or so and there was nothing on them except the stipling 'Manhattan Project.' So I said they don't look like anything I ever saw before.

"... he took a crowbar and pried the lid off of a couple of them. There were some odd pieces of metal in them. There was no packing list in them or anything. No paper of any kind inside the box. Pieces of metal, some had paper, maybe wrapping paper, around some of them. Maybe it was some kind of a preservative paper, I don't know. But that was all that was there. So he told me to go back to my job and he would investigate it further and he would make some phone calls. So I don't think too much time elapsed — maybe a day or two — when he came to my office and he was really pale. And he said, 'You don't know anything about the Manhattan Project!!!! I said, 'No, I don't know a thing about it.' He said, 'I mean, you don't know anything about it.'

"I was startled about it. I said, 'Well, what do you mean? All I know about it is these boxes.' He said, 'You never saw these boxes.' And I began to get the gist of the thing... that I was to forget that they were ever there. But that's all I ever knew about it. I'm sure he didn't know what they were. Apparently he had called someone and he had been told in no uncertain terms — drop it like a hot potato! And he did."

Remembering when the boxes were located, Mary Evelyn Prior said, "Well, the experimental bomb was detonated in Alamogordo. That was in July, I believe. Now this might have been 3, 4, or 5 weeks before that."

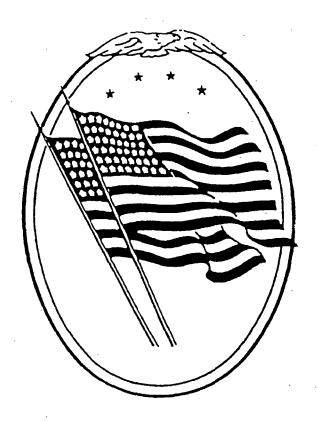
Speaking of the lieutenant's attitude, Mary Evelyn Prior concluded, "He was told to drop it and he didn't want me to remember."

When Jessie McAfee, Chief of Stock Control, was asked by the authors what she knew about the Manhattan Project, she replied, "Well, not much. Because we didn't know very much. It was shipped in and we recorded it in our regular inventory, and then it was shipped out. We didn't know it was shipped out until we got the documents back that said to remove it from stock. That's about the only thing we knew. And we didn't really know anything until the bomb was dropped."

When asked what part of the Manhattan Project was stored at the M.E.D., Jessie replied, "... I don't know what part of it we had. It was stored out here for a short period of time. A few weeks."

Some who claimed they knew more about secret wartime operations, such as storing a small part of the Manhattan Project, refused to disclose what they knew for fear they would be violating those wartime secrecy vows.

After forty years, the haunting memory of military orders and FBI surveillance still lingers in the hearts and minds of those loyal Americans.



### Peacetime Operations

While the end of the war brought about the closing of The Scioto Ordnance Plant almost overnight, The Marion Engineer, Depot continued to serve the national welfare for another 15 years. During this time its functions were varied, if largely routine, but it contributed to the Korean conflict as well as to the needs of a peacetime army. And it was a sizeable factor in the prosperity of the community.

The storage, and care and preservation of materials in storage, was the principal function after the ceasing of hostilities. However, the Depot Maintenance Shop was expanded and was at one time regarded as the outstanding maintenance shop for heavy construction type engineer equipment in the Corps of Engineers.

In 1959, M.E.D. still employed about 1,000 people with an annual funding program of nearly \$7,500,000. Approximately 2,000 tons of supplies were being shipped and 1,000 tons received each month. At that time there was more tonnage of Engineer supplies stored at M.E.D. than at any other depot in the United States.

Improvements were still being made as part of the 1,925,000 gross square feet of covered storage space was being converted to controlled humidity storage, with 556,000 square feet already completed. In addition there was 4,365,000 gross square feet of improved open storage space within the Depot.

Over 100 railroad cars were handled daily on the 24 miles of track by two radio equipped diesel engines. The yard and storage track was capable of holding approximately 1,000 railroad cars.

There was 12 miles of surfaced road within the complex over which the administrative vehicles — sedans, busses, trucks, etc. — were driven a total of 33,000 to 40,000 miles a month.

About 10,000 items of heavy construction and machine tool equipment was in storage there. Approximately \$320,000 was expended annually by the Care and Preservation Branch to check and prevent the deterioration of this inventory. This remedial operation annually consumed approximately 7,500 gallons of oil, 1,500 pounds of grease, and 9,000 gallons of paint.

### Safety Director Reveals Hazardous Materials Stored

After the war, in 1948, Robert "Bob" Ferguson began working at the Marion Engineer Depot in the Fire Department. In 1955 he was transferred to the Safety Office and was then soon promoted to Safety Inspector and eventually Safety Director.

Prior to working at the Depot, and before entering the service, Ferguson worked at the War Department in 1942 under Colonel Hueling, the Scioto Ordnance Base Commander. The offices of the War Department, according to Ferguson, were located "on the second floor of the Citizens Building at the corner of Prospect and West Center." This is where the work of the War Department was carried out prior to the completion of the Administration Building at the S.O.P., the present site of Marion Correctional Institution.

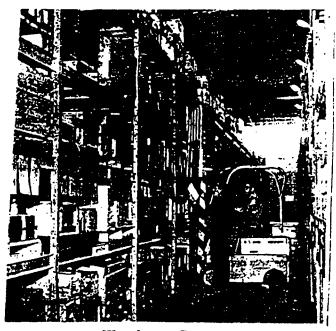
According to Ferguson, the "cluster of black buildings, perhaps gray, (United Parcel now numbered among them), west of Likens Chapel and on the north side of Likens Road, were used for nuclear research both during and immediately following World War II."

The men in charge of the Depot during Ferguson's tenure were Colonel John Phelan, Colonel J. Arthur Hamilton, and once again Colonel John Phelan. During this time, Ferguson said, Milton Staley of Mt. Gilead was Chief of Labor and Equipment.

At the Army Engineer Depot a vast array of equipment was stored in enormous warehouses and sheds, according to Ferguson. "The equipment ranged from radioactive sniperscopes, to spare parts, to cyrogenic cylinders, to crude rubber, to heavy equipment, to Bailey bridge components." Bailey bridges were made by the British and were "floating bridges" which could be quickly erected. They had played an important part in winning the war in Europe.

"In 1948 there were between twelve and thirteen hundred people who worked at the Depot," Ferguson said, "and in 1960, just before the plant was phased out, the numbers had dwinaled to five hundred.

"Because of the danger of radioactive materials warehoused at the Depot, a special building 24'x24'



Warehouse Storage

The photograph vividly captures the warehousing activity near the close of the war. The wooden boxes stored on wooden frame shelving and the forklift working in the background offer a precise historical record of much of the work done inside Warehouse Three (Less than Carload), according to Charles D. Mosher.

was constructed of brick, lead-lined interior walls, and a copper roof to house these dangerous radioactive materials. Concertina wire, triple layers, was placed around it. The building had but one door.

"Eventually the dangerous materials were removed to a dump site, perhaps the ocean," Ferguson continued, "and the work of decontaminating the place commenced, lasting several weeks. It was in 1956-1957 that this process of decontamination took place. The materials were so potent that their half-life was said to be fifty years (or would reduce itself by half in fifty years).

"There were a number of compensation cases filed by persons who claimed to be sick from radiation. Beta gamma detection instruments were employed to check the radiation."

#### Switchman To Engineer

Clyde Weatherbee started work at the Marion Engineer Depot as a railroad switchman in 1943 making ninety cents per hour. Later he was promoted to conductor and made a whole dollar.

Speaking with a sense of justified pride, Clyde said, "I worked for the government for twenty-nine years and three months and never lost a day's pay."

He recalled that there were "several accidents" while they were switching cars where the tracks came into the Depot across 30S (now 309). One such accident took place at the curve. The driver did not anticipate a train across the road, swerved, and struck a tree. "It was a bad accident."

"We had an enormous switching yard," Clyde said.
"Enough track to make up two or three trains. The
New York Central — this was before Conrail — didn't
come into the yard. They picked up the cars on the
other side of Route 30S.

"We serviced all engines in the Round House at the Depot. At the first we had steam engines, but then we had only diesel after the war. We always had four men on a crew. Two served on the engine, a fireman to watch on one side, and the engineer the other.

"After the war we had a radio so that we could communicate with Clyde Richardson, the yard master."

### Snowplows Sent To Memphis

Jessie McAfee said it was a big joke that the snowplows needed so badly in the North were sent down to the depot at Memphis, Tennessee, of all places. She put it this way:

"Well, we always had a lot of snowfalls — right from the very beginning — at the Depot. But, all of a sudden, when it was running towards winter, we got a notification to move our snowplows down to Memphis.

"And this became a big joke because we didn't know what Memphis was going to do with snow-plows. But, probably, they would just ship them back north anyhow. Quite a joke around the Depot that they were being shipped to Memphis."

### The Sandblaster

One of the men who sandblasted Bailey bridges and rusty Army trucks after the war was Herman Johnson. He cleaned up the trucks and masked them in preparation for painting.

Chet Whit was his boss. The operation, at first done outside, was moved into Warehouse Three,

"Department 308."

Herman wore a mask that covered his entire face. "It was a good job. I never saw anyone hurt bad." He worked at the Marion Engineer Depot until it was phased out.

#### Everything Ship Shape

Mr. Robert Ballinger, born in 1903, worked at the Marion Engineer Depot as a welder from 1950-1960. He welded broken frames on cranes, repaired booms, and fixed various parts on caterpillars. He thought a good bit of his foreman, Mr. Edwin B. Geddis.

"Every so often," Mr. Ballinger said, "officers would come through, 15 - 24 of them sometimes, from other places. Had to have everything in good working order. It put you much on nerve. Everything was in good shape when those officers came through."

Years before, back in 1926, Ballinger began working as a welder for the Marion Steam Shovel (later Marion Power Shovel). He was sent to several states to repair shovels. "But," he concluded, "the Marion Engineer Pepot was as nice a place as any I ever worked in my life."

Mr. Ballinger said he especially liked Col. Rene Quenneville who was always friendly.



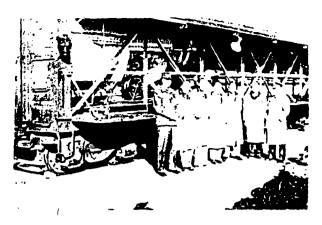
### Sniperscope Stored At Depot

The sniperscope was one of many items stocked at the Marion Engineer Depot ready for shipment. Pictured is a soldier with the sniperscope on his carbine, right, and searchlight on tank, center, which used infra-red rays to provide night mobility. The equipment, developed at the Army Engineer Research and Development Laboratories, Ft. Belvoir, Va. spots objects in the dark with invisible, heat-emitting infra-red rays. (THE MarEnDep TIMES of July 31, 1957)



"Miss Post Engineer"

At a picnic, for Marion Engineer Depot employees, a bathing suit contest was held to name the winner "Miss Post Engineer." The accompanying picture shows Captain Keith presenting Mrs. Pauline Clement, the winner, the prize (Photo courtesy of Pauline Clement).



In 1960 a huge generator from the M.E.D. was shipped to Alaska accompanied by a crew from the Depot. This photo shows (left to right) Col. Phelan, Marion K. Wick, Red Moses, Leo Russell, Harrison Jaycox, John Smith and Capt. Vertres with the generator loaded into a railroad car, ready for shipment. (Photo courtesy Mrs. Marion K. Wick)

### "Best Generators Come From Marion Engineer Depot"

Generators repaired at the Marion Engineer Depot were considered the best in the world Mary Evelyn Prior learned when she was sent to Kaiserslautern, West Germany after the war. She shared this account:

"I hadn't realized that our Depot was very well known and that we had made a reputation for ourselves, because there were certainly other depots across the country and overseas.

"But after the Depot closed I worked for a while in Columbus at the Engineer Maintenance Center. From there I was sent to the Kaiserslautern Army Depot, Kaiserslautern, West Germany as an administrative assistant in this special office.

"While I was there I became acquainted with a German Jewish woman who was working for the U.S. Forces. And during our conversation she wanted to know where I came from. When I said, 'Marion, Ohio,' she said, 'Oh, that's where the good generators come from.'

"Of course, I wanted to know what she was referring to. Marion had a generator repair shop and I don't know how many hundreds and hundreds of generators were repaired out there. Once they were repaired they were put back into stock and were shipped to many places all over the U.S. and overseas.

"Apparently a quantity of them reached Kaiserslautern Army Depot and were in storage there. When army units that drew their stock from Kaiserslautern Depot needed a generator they would frequently say, 'See if they haven't got one from Marion, Ohio. We prefer the Marion generators.'

"This woman knew about this because she had to do with the locator system in the storage division and requests for muterials would come through her. She would hear people saying they wanted generators from Marion. And I thought that was a pretty good mark for Marion."

### The Marion Engineer Depot Closes

It was not without protest that the employees, the city of Marion and the state of Ohio met the announcement that the Marion Engineer Depot would be closed.

The July 6, 1960 issue of the MarEnDep News carried the headline "Depot To Be Phased Down". The Secretary of the Army in Washington had issued a release the day before stating that:

The Marion Engineer Depot, near Marion, Ohio, will be phased down to a reserve storage activity by 30 June 1961. Specified reserve engineer stocks will

remain at Marion Engineer Depot.

707 employees whose functions are being transferred to other locations in the Army Supply System will be offered continuing employment in accordance with Civil Service regulations. The remaining 169 employees whose positions are being eliminated will be assisted in obtaining employment in other federal agencies or private industry. (MarEnDep News, July 6, 1960. Courtesy of Kathryn Hazen Wittred)

At 3:00 on July 5th all Depot employees were called to Shed 10 and Major Glenroy Ryan, Acting Commanding Officer, read the release from Washington and a letter shown at right from Colonel Phelan, Commanding Officer, assuring the employees of his efforts to insure them of job rights and placement.

A press conference was held following the meeting with representatives of the city, the Chamber of Commerce and the press and radio.

### Former Employees Resigned To Closing

Jessie McAfee gave her views on why the Marion Engineer Depot was closed when others remained

"I think they felt it was supposed to be a temporary place when they built it. They had plenty of permanent depots that had been built.

"So we started in and had sales of what we could sell. In fact, my back porch, the beams and all, are part of the shipments of bridge parts that went up for sale. We shipped a lot of bridge parts. I knew they were to be put up for sale on the next big sale, so I went out and bought what I had to have. So that is where part of the lumber for my porch came from. I had been thinking about putting a back porch on the back so when the bridge parts went up for sale that was just a good time to do it."

### MarEndep Times

## DEPOT TO BE PHASED

Continues and the property of the continues of the contin

vere Meyer Karl Dane, Mr. Jasj Secretary of the Cha

Charles North of DE MARION SIAN, and Mr. Charles North of India nation BODY. On tallioning services North of India nation BODY. On tallioning personnel from the department present. Major Garciary Arms. Major N. S. Sewerrer, Gaptas North A. Jones, 1974. Severes Charles North A. Jones, 1974. Treat. Algorishment of Lawrences North Assertion Federation of Detection Conference on all Conference Capitals. nere its Freesdont, 'Cr. Signale Persinger and its fice President of Clyde Seather

prompts usual up Congressment of the Araconsociation over recognitional of the operconsociation over recognition and the expecttion. The principal Continue of the expecttion that startupe, an internance and severing,
it consider supprises and equipment. An inprocessing a name have deput to the processing of the processing over the continue of the deput to a recover
exercise citizately executably will have
foreign terminations that transfers, a direct
foreign termination of the foreign
foreign terminations are startled for
foreign termination of a factor.

The foreign termination of the depair
foreign termination of the foreign
foreign termination of a foreign
foreign termination of the foreign
foreign
foreign termination of the foreign
f



Painful as it was for many, the closing of the Marion Engineer Depot became a reality. The following personnel policy reveals the procedure taken in closing down a depot that had served so well through two wars and over eighteen years. (Courtesy of Pauline Clement)

#### PERSONNEL POLICY FOR THE CLOSE-OUT OF HAPJON ENGINEER DEPOT

- 1. As soon as possible, all Depot employees will be immediately notified of the inactivation of the Depot and of their rights as prescribed in this policy and applicable personnel regulations, including DO 740, Supplement 2, 23 June 1960. Recruitment (except for short term temporary limited employees), promotion, and reassignment actions will be frozen at Harion, and at the receiving Depots by competitive levels involved until the transfer rights of all Harion employees willing to transfer have been firmly determined, but not beyond 30 September 1960.
- 2. Employees of Marion Engineer Depot identified with functions being transferred will be granted transfer rights. Determination of such rights in the Maintenance (O&F) Branch and Depot Administrative Office will be made by review of job description against criteris in DO 740, Supplement 2. Employees in all other functions will be granted RIF rights but they will not compete for positions in functions that will be transferred. Approval of CSC will be obtained in accordance with CPR RJ.4-8 for the latter provision because the phase-out will extend beyond 90 days.
- J. Total obligations of each receiving Depot will be determined by applying the percentage of transferred workload to the current work force of Harion. Employees clearly identified with a function going to a particular location will have rights to that location. To determine the obligation of the receiving Depots for the remainder, the same workload percentage figures will be applied to the grades and occupation of the current Harion work force to determine the numbers of employees by grade within each occupation. Losing and gaining offices will negotiate to resolve problems in this area.
- 4. Employees will be polled to obtain information as to (1) willingness to transfer and (2) order of preference of the Depots they desire.
- 5. Except for employees clearly identified with a function going to a specific location, each employee willing to transfer will be given the order of his preference of locations based on his retention standing within his skills area. Preference of location will be honored in the order or retention rights only to the extent of the receiving Depots' obligation for a number of employees by grade in each occupation.
- 6. After the receiving Depot has been determined for each employee, the employee will be merged into the retention register of the receiving Depot and will compete for available positions in accordance with RIF regulations. When more than one employee in the same competitive level occupies a position designated for transfer in any increment, the employee(s) with the highest retention standing will be transferred first. Each employee will be permitted to compete in only one receiving Depot.
- 7. Dates of transfer to the receiving depots, for those willing to transfer, will be established jointly by the Commanding Officers of the losing and receiving depots with full consideration given (a) the workload requirements of Harion to meet the schedule of phase-out approved by the Secretary of the Army and (b) orderly accomplishment of additional workload at the receiving installation.
- Employees unvilling to transfer will be retained in their position at Marion based on the needs of the Depot Commander and then separated for failure to accompany the transferred function.
- 9. Subsequent to initial announcement of the inactivation, all positions will be filled by detail, if possible, or by limited appointments. When numbers in any mission area are to be reduced, that area will first be reduced by terminating limited appointments and next by employees on detail inpositions affected. Such employees will then be disposed of in accordance with ground rules covering their competitive area.
- 10. The CO, Marion, will, in all instances, follow the release policy for employees of the Depot as stated in UPR N1.5-1. In the event the work force at Marion Depot deteriorates so that the work load cannor be carried by the remaining employees, consideration will be given to extending RLF notices or separations for failure to accompany activity, temporary hiring, or to detailing employees from the receiving Depots to Marion on a IDY basis to assist in the close-out.
- 11. Preference for short-term hires will be given first to employees' separated by RIF, and then to those separated who were unable to accompany the activity.
- 12. The Civilian Personnel Officers of Marion and the receiving Depots will render maximum assistance to all employees (of either Marion or the receiving Depots) who are not placed or who are displaced as a result of this close-out.

Micmphis, Schenectady, Columbus, Atlanta, Utah and Sharpe General Depots, and Granita City Engineer Depot (unless concurrent mission changes make such a freeze impracticable).

#### Destination of Personnel

The following directive describes the destinations for personnel in various functions at the Marion Engineer Depot as the plant was being phased out. (Courtesy of Pauline Clement)

### MARION ENGINEER DEPOT

U. S. ARMY MARION, OHIO

ENGDN-P

15 July 1960

SUBJECT: Transfer of Function

· TO:

Mrs. Fauline R. Clement Supervisory Cash Clerk Finance & Accounting Branch Comptroller

Marion Engineer Depot

Marion, Ohio

1. As you have been advised earlier, as a part of the overall plan for the improvement of the COMUS depot system, it has been determined that most of the functions of this office will be transferred to Quartermaster Depots or the Granite City Engineer Depot, as indicated below:

#### FUNCTIONS

### TRANSFERRED TO

Ma	1 2	ten		
гш	111	Len	ыц	CE

Schenectady, Granite City and Memphis

Cryogenic Repair

Granite City

Storage & Distribution - Spare Parts

Columbus

Storage & Distribution - End Items

Schenectady, Granite City and Memphis for the most part, with possibly a small portion to Atlanta, Utah and Sharpe

Support Personnel - Administrative Staff identified with Comptroller, Planning, Safety, Personnel, Transportation and the Medical

Columbus, Schenectady, Granite City, and Memphis, based on percentage charged to the functions identified above

The effective date of the transfers and separations will be phased as indicated below with 30 June 1961 as the target date for placing this installation in a standby status:

DATE	APPROX. IM. OF EMPLOYEES TO BE TRANSFERRED OR SEPARATED
September 1960 31 Murch 1961 30 April 1961 31 May 1961 30 June 1961	100 200 200 200 200 176

15 July 1960

ENGDN-P SUBJECT: Transfer of Function

All sections will be accomplished under Army Department regulations and the personnel policy which has been established by the Chief of Engineers and the Quarternaster General, a copy of which is attached for your information.

- 2. Each employee who is identified with the functions being transferred is entitled to accompany his functions to a new location, if he desires. Unless otherwise informed, all employees of the Depot Administrative Office and Maintenance (O&F) Branch, Miscellaneous Services Division, have transfer with function rights and will state their transfer preference on the attached form. To the extent possible, each person who is willing to transfer with his function will transfer at his current grade and salary. However, the exact grade cannot be determined until a list of all employees who are willing to transfer is consolidated with the list of employees at the new installation and a new reduction in force register is established, based on the retention rights (Civil Service status, years of service and Veterans Preference) of all employees involved. At that time specific offers will be made based on the priority standing of each individual and jobs necessary to accomplish the continuing functions. Any employee who cannot be assigned at his current grade will compete with all other employees at the gaining office for placement in a lower grade under reduction in force procedures, if he so desires. If he does not desire to move to the new location at a lower grade or if there is no position available, he will be separated from this office by reduction in force. A separation by reduction in force will entitle the employee to have his name entered on the priority placement list at both this office and the new location, and if he has career or career-conditional status, to participate in the Separated Career Employee Program conducted by the Civil Service Commission in this Area.
- 3. Any employee who declines at this time to accompany his position to the new location, or who now agrees to go and later declines an offer at his current grade and salary will eventually be separated by "Separation Unable to Accompany Activity". Also, an employee who indicates that he is willing to accept a lower grade at the new office and then later declines to make the transfer will be separated by "Separation Unable to Accompany Activity". The effective date of such separations will not be before 5 September 1960. Specific information will be furnished each employee involved as accompany as it is determined which positions will be eliminated at each of the above dates.
- 4. A "Separation Unable to Accompany Activity" does not grant any of the benefits given employees separated for reduction in force, disqualifies an employee for entry on the reemployment priority list and prevents participation in that part of the Separated Career Employee Program involving displacement of non-status employees.
- 5. To determine your desires, the attached questionnaire should be completed by you and returned to the Civilian Personnel Office not later than 21 July 1960. Employees willing to transfer and identified with functions going to more than one location will be considered for assignment at the location of their choice based on their retention rights. Employees who are not willing to transfer will be retained in an employment status at this office as long as possible, and then separated for inability to accompany the activity. In the event of a reduction in force in the positions not subject to transfer, the surplus employees will compete only with other employees not subject to transfer, in accordance with a plan approved by the Civil Service Commission.
- 6. Transfer of employees with the function will be at Government expense, including shipment of household goods as provided in CPR T3, "Civilian Travel".
- 7. Additional general information on this subject may be obtained from the Civilian Personnel Office. However, the exact date of the transfer of each position and the exact position to which an employee is entitled are not available yet. This information will be furnished by separate written notice to each employee involved, as soon as available.
- 8. It is regretted that this action has become necessary. You may be assured that we are taking every possible effort to protect your interests, and to determine your rights on an equitable basis.

FOR THE APPOINTING OFFICER:

2 Incl

1. Pers Plcy

2. Questionmaire

JOHN FREDERICK, SR. Personnel Officer

### Percy Weaver Transferred To Granite City Depot

In 1961, after the Marion Engineer Depot phased out, Percy Weaver moved his family to Granite City, Illinois where he was given government clearance to go down into missile silos to weld.

Mrs. Weaver added proudly, "When he went out to the Granite City Depot he had certain angles in welding that they hadn't seen before. These were used by others afterwards. He was his own boss there."

When Mr. Weaver finally ended up at Wright-Patterson, he joked to his fellow workers: "It took me twelve years to close down the Marion Engineer Depot, ten years to close down the depot in Granite City, and I'll see how long it takes me to close this one."

### Bond of Friendship Ten Years Later

The Depot Reunion, held in 1970, ten years after its closing, gives some indication of the close bond that existed between fellow employees and between the employees and the depot that they fought to keep open.

THE MARION STAR article of June 26, 1971 telling of the reunion, also gives a fitting summary of the history of the Marion Engineer Depot:

Former employees of Marion Engineer Depot are getting together today, 10 years after the installation's closing. More than 500 are expected, some from Arizona, Missouri, Tennessee, New Jersey, Georgia, Virginia and Kentucky.

Their purpose in coming? To see old friends and recall the way things used to be when the Depot was alive and thriving.

The facility at one time had the largest concentration of engineer supplies, in both dollar value and tonnage, of any in the United States. In addition to the Depot's primary function of storing newly-manufactured equipment and eventual dispersal, used equipment, shipped from overseas, also was renovated and sent out again.

The Depot covered 650 acres, had 99 buildings, more than 11 miles of roadway and upwards of 20 miles of railroad track. It employed about 1.200 civilians during the mid-50's and about a dozen military personnel.

The installation was built during World War II, in 1942. An initial allocation of \$4,000,000 was made for planning and construction, work began in June and the facility was completed in November. Marion was chosen for the site because of its proximity to railroads, construction equipment and because of the availabilty of skilled workers.

The Depot had its own newspaper, fire department, softball and bowling teams (the latter won a world championship among engineer installations) and dozens of job-oriented and recreational and social activities and programs for its employees.

From December 1944 until after the war ended, the Depot used German prisoners of war as mechanics, cooks, painters and general laborers. They were even loaned to local farmers.

Ten years later, the army began to phase out the operation, in the interests of economy and with the Depot's growing obsolescence in the face of changing



Bond Of Friendship

The Depot Reunion, held in 1970, ten years after its closing, gives some indication of the close bond that existed between fellow employees and between the employees and the Depot that they fought to keep open.

Mrs. Fran Phelan, widow of former Marion Engineer Depot commanding officer John F. Phelan, was photographed flanked by two other Col. Rene Quenneville (left) and J. Arthur Hamilton, at the 10th anniversary of the facility's closing. Over 500 past employees of the Depot got reacquainted over a picnic dinner. Marion Jaycees helped in the affair. Tentative plans are being made for another reunion in five years.

methods. But the phaseout did not come without opposition from the city, Governor Michael DiSalle and Senators Frank Lausche and Stephen M. Young.

Land and buildings on the Depot were sold. River Valley High School now stands where the POWs were once housed. MARCA School is on part of the old Depot grounds. So is the National Guard Armory and Plant City Steel Company. (excerpted from article by David Drake, "Reunion at The Depot" THE MARION STAR, Sunday, June 26, 1971)

### The Secret Is Out

After much correspondence with government bureaucracy in Washington, D.C., calls to General Services Administration, conversation with guards at the Marion Engineer Depot, present and past, and assistance from Congressman Michael DeWine, all without a positive result, the researchers decided not to make further attempts to gain permission to videotape the inside of Warehouse Three at the Marion Engineer Depot.

It seemed such a small request; but GSA, no doubt, had their reasons for failing to grant the requested permission. People speculated about it: "The poor condition of the warehouse is embarrassing to them," "They have important matters to hide," or, finally, "That is typical government bureaucracy."

The following research by Matt Harvey, staff writer for THE MARION STAR, published Tuesday, May 27, 1986, may suggest a clue:

Probably not many people locally happen to know that several thousand tons of assestos happen to be stored in their county.

The General Services Administration, owner of the asbestos, basically has kept the existence of the toxic

material a secret and says it had done so in a legal

Now, the government agency is about to take the more than 4,000 tons of remaining asbestos at the GSA - Federal Property Resources Service Marion Depot to the road.

"Presently, only the transportation of radioactive, flammable and cryogenic materials requires public notification," the GSA states in a recent report to THE STAR. "Our operation at the Marion Depot does not involve the handling or transportation of these materials."

The abestos at the Depot, located on Ohio 309 east of Marion is scheduled to be moved to the Warren Depot by October 31. About 2,000 tons of tannin, a substance used in the tanning of hides, also is stored at the Depot and is scheduled to be transported by June 30.

The materials must be moved because of the deteriorating condition of the Depot, according to GSA.

Despite a lack of willingness to voluntarily disclose the storage of asbestos locally, the GSA maintains that no safety hazard has been or will be posed to businesses, schools or residents in the area.

"Due to the safety, health and environmental controls that the National Defense Stockpile has established and implemented, the storage of hazard ous materials . . . at the Marion Depot poses no threat to human health or the local environment.

Asbestos, in broken-down form, has been linked to nasal cancer and lung diseases. It often is used for insulation purposes.

According to the report, the qualifications of em-

ployees are thorough.

"All stockpile Depot personnel are qualified in their own specific job specification," the report states. "They have also been trained and instructed in the procedures outlined in our occupational health guidelines concerning respiratory protection, personal protective clothing and clean up/decontamination procedures.

"All work involving hazardous materials is closely monitored by qualified Quality Assurance Specialists who supervise, environmentally monitor and analytically determine sample results.

"In addition, all Depot employees are part of our annual Medical Surveillance Program which has been approved by the Office of Personnel Manage-

The Marion Depot is a satellite of the Warren Depot, according to the report. Employees from Warren commute to Marion when required.

### Present Uses Of Depot Area

Driving along the main road leading east from Marion, now renumbered State Route 309, the two mile long complex of cement block buildings still makes an impact on the rural landscape. Kennedy Park with athletic fields and the Senior Citizens Center has been created at the west end and the former farmhouse that was once the home of the commanding officers of the Depot is now used by the Marion City Park Services. Three schools, MARCA, River Valley High School and River Valley Junior High School, occupy parts of the original Depot area. No sign of an army camp or prisoner of war barracks remain.

The buildings have been adapted to many uses. Through the years they have been used by the Ohio National Guard, Borden Inc., Otis Wright & Sons Inc., Neighborhood Youth Corporation, Marion Crawford Community Action, Greif Bros Corp., Nu-Supply Warehouse, Hasco Division-Oury Engineering Co., Plant City Steel Company. Music once resounded as bands practiced in a former warehouse.

The current Marion County Directory lists these establishments: Marion Industrial Center, Mid-Ohio Gymnastics, General Service Administration Public Buildings, Plant City Steel Company and Getman Brothers — the last two as divisions of Harsco.

Some of the buildings have been renovated with aluminum siding over the cement block construction and the interiors refitted for offices. Loading docks have been built and various companies use the storage facilities. A General Services Administration sign still stands alongside a rusting gate. Some of the buildings at the east end of the complex remain empty with broken windows, scaling paint and deteriorating concrete. No smoke issues from the former power plant tower.

No longer do long lines of cars issue from the gates each evening at 4:00. And traffic moves smoothly along the route now called 309 where for years the double yellow lines caused slow downs. Cars bump across the spur of the railroad that crosses the highway, almost never halted by a switch engine pulling cars of materials in or out of the Depot.

But memories of the Marion Engineer Depot still live in the hearts of those whose lives it touched. This is their story.

### Statistics Show Size of Operation

Some statistics show the scope of operations at the Marion Engineer Depot.

The Depot loaded 1,544 cars and unloaded 1,231 cars of material and equipment during the month of May 1945. Peak tonnage handled was reached in May 1943 with 44,000 tons of troop stock shipped and 23,000 tons received.

Peak employment totaled 47 Military personnel and 1,478 civilians in July 1944. There was a minimum of 416 civilians employed in September 1947.

Prisoners of war were encamped at this Depot and utilized on labor and mechanical work from December 1944 to February 1946, a total of 344 being utilized in April 1945. (Taken from the brochure "180th ANNIVERSARY OF THE U.S. ARMY AND THE CORPS OF ENGINEERS)

### TIMELINE

# Part III

## Prisoners Of War

December 1944	First Discusses of Way Assiss of M.P.D.
	First Prisoners of War Arrive at M.E.D.
March 2, 1945	Prisoners strike.
April 1945	Additional POWs arrive from Camp Perry.
October 1945	POWs assist Marion County farmers.
1946	Camp Marion closed.
1947	Former POWs correspond with Marionites.
1985	Moshers resume POWs correspondence

# Prisoners of War Come to Camp Marion

One can easily imagine the varied emotions that beset communities upon learning that prisoners of war, the despised enemy, were coming into their area to live and work.

Camp Marion, located at the Marion Engineer Depot, was a branch camp for German prisoners of war. It was directed by Camp Perry, a base camp, located near Sandusky, Ohio. The first contingent to arrive contained about 250 men. They arrived in December 1944 and were housed in barracks at the east end of the Depot in the same area that the Engineer Corps soldiers had been earlier.

Milton Staley, Branch Chief over Labor and Equipment, said that there were "... eleven barracks located on twenty-five acres." He further said that the barracks at the S.O.P. and the M.E.D. combined could accommodate 500 POWs, and that while most of them were German, and had been attached to the Afrika Korps under Rommel, there were also some from Italy, France and Czechoslavakia.

These POWs were brought to Camp Marion to help swell the lean work force at the Scioto Ordnance Plant and the Marion Engineer Depot. All prisoners were required to work at jobs assigned as long as those tasks did not violate the Geneva Convention.

The following kinds of tasks were assigned at Camp Marion: cutting grass and weeds, cleaning up litter on grounds, washing windows, sweeping and scrubbing floors, farming, cleaning fish for cafeteria, handling freight, working on machinery maintenance, truck driving and maintenance, collating documents in offices, and handling empty bomb shells.

POWs were paid 80 cents a day in coupons for their services. Their lunches, while adequate to keep them strong and active, have been described by several eye-witnesses as inadequate to satisfy appetites of working men. Because of this spartan diet several civilians secretly offered the prisoners cookies, candy, tomatoes, oranges, crackers and hard field corn soaked in barrels of water.

In April of 1945 an account in THE MARION STAR suggests that more prisoners would be coming from Camp Perry and would likely be housed

on the Scioto Ordnance grounds:

The number of German prisoners of war in Marion County is being increased from around 250 to 400 in a program now under way, army officials at Camp Perry announced today.

Lt. Col. E. C. McCormick Jr., commander of the German prisoner of war camp at Camp Perry, under whose direction branch camps such as the one at the Marion Engineer Depot are operated, said one main branch camp for Marion will be established at the Scioto Ordnance Plant site.

Although he was not specific about the location of the camp, it was expected that unused dormitory buildings in the administration area of the ordnance plant might be pressed into use for that purpose. They were built originally to provide sleeping rooms for workers at the plant, but were virtually unused for dormitory purposes.

Col. McCormick said a request for prisoner labor at the Engineer Depot caused the expansion work. It was assumed in the light of his announcement that the prisoners would be housed entirely at the Scioto Ordnance Plant area but employed as workers principally at the Depot. Whether they would be employed on some projects at the ordnance plant site was not indicated.

Capt. Douglas Mitchell, the first camp commander at the prisoner of war branch camp here, is returning to assume command of the branch and First Lt. Jerry Baker, present branch camp commander, will remain and become executive officer, Col. McCormick said. (THE MARION STAR, April 4, 1945.)

Tom E. Myers, superintendent at the S.O.P., describing the prisoners said, "Many of the older and first prisoners of the war were friendly and cooperative. Many of them opposed what Hitler was doing. The later and younger prisoners were very often hostile and combative." He recalled that some of the first POWs to arrive were housed in tents for a short time until adequate facilities could be arranged.

The author stood on the old barracks grounds at the Marion Engineer Depot and recorded the following words on videotape:

"Almost nothing survives that wartime period. The distant fence marks the western boundary of this 25acre compound here behind River Valley School. The old sewer lines and water mains are the only remaining evidence of an important period in world history long gone.

"It was here on these very grounds that POWs went on strike and were required to stand in the muddy field near this prisoner compound while occasional showers fell.

"The perimeter of the Camp Marion grounds was well lighted with flood lights held on tall poles. Guard towers, manned by both men and women guards, were strategically placed to insure the security of the area."

Louis V. Dutton gave the following account of his mother's work at the M.E.D.:

"My mother was Jessie Anna Dutton. She worked at the Depot from 1942-1945 as a guard over the POWs. There were three or four other women who served as guards in the towers that were about 40 feet high. They used K-9 Korps dogs to patrol the perimeter of the grounds. At night, floodlights were used to illuminate the compound. The women carried .39 pistols and wore special uniforms."

Louis chuckled as he remembered one of his mother's experiences and said that a First Lieutenant came up into the tower and said to his mother, "Give me your weapon." With reluctance she surrendered her weapon to the young officer. Upon doing so, she received a firm rebuke. "You never surrender your weapon without first asking, 'Are you relieving me from duty?"

Much impressed by this unforgettable experience, Mrs. Dutton shared the experience with her son, Louis, who was serving in the military service.

A few weeks later the same officer came up and asked her again for her weapon. Mrs. Dutton answered, "My son said I was to give it to you right across your head!". Then laughingly, she told him that her son was in the military service.

Jim Jackson, a 99-year-old black man, said that while working at the Boxing Plant at the Depot he would look southeastward, toward where River Valley School is now, and see the prisoners of war out there.

"I never worked with any of them, but I could see them in the distance," Jim said reflectively, his eyes gleaming and mind clear. "They lived in gray barracks. Made of metal, I believe. I don't think they were wood because prisoners could set them afire and burn them up.

"There were — oh, maybe — ten or twelve barracks, as I remember. They were a long way off and I never was in there. You weren't allowed to get over in there."

Don Meily, in charge of the electrical distribution for the whole Depot, worked with prisoners of war there and was sometimes sent out on barracks maintenance calls. Meily described his work:

"I was down there at the POW barracks several times on maintenance trouble calls. I had one prisoner of war there in the shop. He made calls for me."

Speaking of the barracks, Meily said, "I'd say off hand they were maybe about 30 feet wide — about 40 feet long — something like that. I'd say there were around 10 of them. I never counted them."

Thomas A. Stringfellow recalled that the barracks were located behind (south) of the warehouses at the end of the depot grounds. He further remembered that "prisoners were housed at the Marion Engineer Depot and the Scioto Ordnance Plant grounds at the same time."

Kathryn Hazen Wittred, who worked at the M.E.D. during the war described the POWs compound at Camp Marion, saying, "They were back near routes 309 and 98. They were wooden barracks and when the POWs were not working they would be in the barracks or out in the yard which was all fenced in. We had four towers with women that would guard from the towers. They would climb up there and sit in there. One of the guards was June Reardon. I remember her very well. She married a Lieutenant Cox from our post."

### Base Camps and Branch Camps

Camp Marion, being a branch camp, was smaller than the base camp at Camp Perry on the shores of Lake Erie. It was set up to provide labor for the Marion Engineer Depot during a critical labor shortage during the war.

While the Corps of Engineers made every effort for the base camps to be located on approximately 350 acres, the branch camps were located on many fewer acres. Camp Marion, for example, had an area of 25 acres.

In order to guarantee seclusion, the camp was not to be located "less than 500 feet from any important boundary or public thoroughfare," according to specifications.

Judith Gansberg in her book, "STALAG U.S.A.", describes the two kinds of camps:

Prisoners lived in two kinds of camps planned for the efficient employment of POWs and maximum use of available housing. The preferred life-style was at base camps planned as permanent facilities for the full administration of prisoner needs.

Branch camps (at first called side camps) were designed to fill permanent or temporary work needs as additions to the base camps. While they had their own staffs, branch camps were directed by the nearest

Besides the necessary living areas, all possible needs were covered by the facilities at most camps. There were maintenance shops, chapels, orderly rooms, a dispensary, a laundry, a canteen for POW's and a PX for GI's, mess halls, workshops, recreation buildings, outdoor recreation areas and even a POW cemetery.

The POW enclosure, as at all camps, was divided into four compounds: three residential and one for recreation. All were surrounded by the standard double-woven wire fence topped with barbed-wire overhangs...

Krammer in his book, NAZI PRISONERS OF WAR IN AMERICA (Stein and Day, 1983), describes a typical POW camp:

The base camp was divided into four main compounds of approximately 500 to 750 men each, and each compound, in turn, consisted of four barracks with about 150 men each as well as a mess hall,

### POWs Required To Work

The prisoners of war at Camp Marion were required to work at the tasks assigned as long as they did not violate the Geneva Convention. Their tasks varied at the Scioto Ordnance Plant area and at the Marion Engineer Depot.

Among the many tasks the prisoners of war were obliged to perform was painting barns and sheds on the S.O.P. grounds. Kenneth Foos described this aspect of their work:

"The barns were painted with an olive green water paint. The one my great, great grandfather owned they painted a bright red and trimmed it in white."

Tom E. Myers admitted that he was obliged to use prisoners of war to handle bomb shells due to the extreme manpower shortage in the area. He explained:

"Now we averaged from 100 to 200 men that were available, but I didn't want them standing around. We couldn't have that. You had to have them busy. So how many would be needed we might know a day or two in advance.

"We always figured ten to twelve more because we didn't know how many of our own crew were going to be absent. We could always find work for those extra few to do. We never allowed them inside the buildings. They were never permitted in the bays (where the bombs were being filled). Of course we allowed them to have shelter in certain sheds against storm. We would never treat them that way. I felt we needed to set a good example — to be humane in every way."

When the author asked Tom what he had the POWs do in the bomb area, he replied candidly, "The POWs handled the nose pieces, tails and empty shells before they came into the assembly area."

"They were good workers," Tom concluded, "and we had trouble with them only once. But it was nothing but what the guards could handle."

Charlie McNeal said that, while he did not work with POWs directly, they were used in the same building where his blacksmith shop was located at the S.O.P. He recalled that many of them were quite good mechanics. One was able to repair a piece of equipment after the other men gave up on it.

"There were the arrogant type too," Charlie said.
"But most I saw were good fellows, easy to get along with."

### POW's Work at M.E.D.

Clarence B. Messmore, now 88 years of age, worked at the Marion Engineer Depot as Store-keeper at Shed Seven. Behind each warehouse was a large open shed. Shed Seven was located behind Warehouse Two. Before he could work at the depot he was required to have a "release" from the County Agriculture Board because agriculture was an essential part of the war effort.

Although he never worked at the Scioto Ordnance Plant, he recalled that boxes to ship bombs were made by Wade Stevens who owned two box factories in Galion. The boxes were trucked over.

Mr. Messmore explained that he worked with POWs and he said with emphasis, "They sent POWs there with a supervisor who knew next to nothing about the work. They (POWs) took a bit in the mouth better than most Americans would at that kind of work. They unloaded and stacked the Bailey bridges."

"It was all bridge steel stuff, all the way up to Warehouse Five. One Saturday we loaded thirty-two cars. We worked around the clock. That was in 1945. We worked as many hours as we wanted to work. Twelve hundred bridges would represent thirty-six carloads."

Messmore also recalled that the engineers ran water pipes over to the POW barracks from the water supply reserved for the depot.

Martha Haines worked at the Marion Engineer Depot from 1944-1951 as a Checker and Stenciler. Later she worked in Field Office Inventory.

Among other things, she checked the Bailey bridges "to make sure that there were 120 panels to the span." The bridges were loaded onto gondolas.

Mrs. Haines said she worked among prisoners of war from time to time. A man who was crippled, whose name she has forgotten, was the foreman of the gang. He worked the POWs in such jobs as "loading boxes and hooking the crane to the boxes."

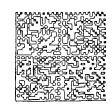
EMLZ

201/824881-824803 RG 77 (formerly RG 338)

Marion Engineer Depot Marion, Ohio March 22, 1991

		- Alexandra Clark	
вох *	TYPE OF RECORD	YEARS	CU. FT.
1	General Orders	52-56, 58	1 1/2"
	Brochures	60-61	1/4"
	Conferences Files	51-58	7 1/2"
	Installation Historical Files	44-47	3"
2	Installation Historical Files	48~59	lou.ft.
3	Installation Historical Files	60	7"
	Newspapers	56~60	3 1/2"
, 4	Organization Planning Files	52-61	9 1/2"
	Pamphlets	56-57	1/4"
	Progress Analysis Files	56-57	2 1/4"
5	Progress Analysis Files	58	1 1/2"
	Standard Operating Procedures	51-52, 54-58	10"
	Unit History Files	51-52	1/2"
	,		
		·	
		:	
<del>              _</del>			<del>                                     </del>
			-
	\.		

U.S. ARMY LEGAL SERVICES AGENCY ENVIRONMENTAL LAW DIVISION 901 N STUART STREET, SUITE 420 ARLINGTON VA 22203-1837



016H26507568 § 04.800

06/12/2008 Mailed From 22203 US POSTAGE

HUMANE ZIA (31862)
U.S. ENVIRONMENTAL
PROTECTION AGENCY
REGION III
1650 ARCH STREET
PHILADELFHIA, PA 19103-2029

RC41

5th f